BOREHOLE LOG: GP-01

SAMPLE INFORMATION

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473727.34 E: 4685895.89 GROUND SURFACE ELEV.: 1052.82 DATUM: N/A START DATE/TIME: 11/20/2010 7:40:00 AM

END DATE/TIME: 11/20/2010 9:45:00 AM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 30 DEPTH OF SOIL DRILL: 30 DEPTH OF ROCK CORE: PLUNGE:-90 AZIMUTH: N/A

						SAIVI	PLE INFURMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1050.0 _	GRAVEL FILL Soft, light olive to dark gray, CLAY with trace Sand.		S1	DPT	0.0	40 / 60	0.0-0.25 ft-bgs: GRAVEL FILL. 0.25-4.0 ft-bgs: Soft, dark gray (N3), CLAY, trace fine Sand, damp [CL]. 4.0-5.0 ft-bgs: Soft, light olive gray (5Y 6/1), CLAY, trace fine to coarse Sand, damp [CL].		Well Not Installed
1045.0 _	Stiff to soft, light olive to dark gray, SANDY CLAY. SAND LENS Stiff to soft, light olive to dark gray, SANDY CLAY.		S2	DPT	0.0	44 / 60	5.0-5.75 ft-bgs: Loose, light olive gray (5Y 6/1), CLAYEY SAND, fine to coarse Sand, wet [SP]. 5.75-8.0 ft-bgs: Soft, light olive gray (5Y 6/1), SANDY CLAY with trace iron staining, moist-wet [CL]. 7.0 ft-bgs - Sample is damp (less moisture than above and below), 8.0-8.1 ft-bgs: fine to coarse SAND. 8.1-10.0 ft-bgs: Soft, light olive gray (5Y 6/1), SANDY CLAY with trace iron staining, moist-wet [CL].		
- 1040.0 _ -			S 3	DPT	0.0	30 / 60	10.0-11.0 ft-bgs: Loose, light olive gray (5Y 6/1), CLAYEY SAND, fine to coarse Sand, wet [SP]. 11.0-15.0 ft-bgs: Stiff, olive gray (5Y 4/1) SANDY CLAY, trace silt and trace carbon staining, wet [CL].		
1035.0 _			S4	DPT	0.0	41 / 60	15.0-18.0 ft-bgs: Stiff, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand and trace fine Gravel, wet (CL). 18.0-20.0 ft-bgs: Soft, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand and trace fine Gravel, wet (CL).		
1030.0	AOL OOM LEGEND		\$5	DPT	0.0	365 / 60	20.0-25.0 ft-bgs: Soft, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand and trace fine Gravel, wet [CL].	-	

LITHOLOGY LEGEND

Fill (made ground) USCS Poorly-graded Sand (SP)



USCS Low Plasticity Clay (CL)



USCS Low Plasticity Sandy Clay (CLS)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen







BOREHOLE LOG: GP-01

PAGE 2 of 2

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473727.34 E: 4685895.89

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 30 DEPTH OF SOIL DRILL: 30 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-5 GROUND SURFACE ELEV.: 1052.82
DATUM: N/A
START DATE/TIME: 11/20/2010 7:40:00 AM
END DATE/TIME: 11/20/2010 9:45:00 AM PLUNGE:-90

	H. N/A PLUNGE90					0	n. m. 1. 1. m. n. 1. m. n. 1.		
Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att.	PLE INFORMATION Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
- 025.0 _	Stiff to soft, light olive to dark gray, SANDY CLAY.		S6	DPT	0.0	40 / 60	25.0-30.0 ft-bgs: Soft, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand and trace fine Gravel, wet [CL].		
020.0									
015.0									
010.0									
.005.0									

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

USCS Poorly-graded Sand (SP)

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOG: MW-01/GP-02

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473727.53 E: 4685877.23 **GROUND SURFACE ELEV.: 1052.8** DATUM: N/A

START DATE/TIME: 11/20/2010 10:00:00 AM END DATE/TIME: 11/20/2010 10:25:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

AZIMUTH: N/A SAMPLE INFORMATION Graphical Sample No. or Run No. /Att Soil Sample Description Depth Elev. LITHOLOGY DESCRIPTION (mdd) Rec.// Log Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil **GRAVEL FILL** Soft, dusky yellow to dark gray, CLAY with trace Sand. Steel flush mount with locking cap. 0.0-0.25 ft-bgs: GRAVEL FILL. 0.25-3.5 ft-bgs: Soft, dark gray (N3), CLAY, trace fine Sand, damp [CL]. 3.5-5.0 ft-bgs: Soft, yellow (5Y 5/4) with mottling, CLAY and fine to medium 0.0-0.75 ft-bgs: Cement seal. S1 40 / 60 0.75-4.0 ft-bgs: 0.0 1050.0 Bentonite chips. SAND, moist [SC/CL]. 4.0-10.0 ft-bgs: Filter sand pack (20/40 sand). Stiff to soft, light olive gray, SANDY CLAY with iron and 5.0-10.0 ft-bgs: 5.0-6.25 ft-bgs: Soft, light olive gray (5Y 6/1), fine SANDY CLAY with trace organic staining. 1.5-inch pre-packed PVC well screen. Loose CLAYEY SAND LENS iron and organic staining, moist [CL]. 6.25-6.35 ft-bgs: Loose, light olive gray Stiff to soft, light olive gray, SANDY CLAY with iron and (5Y 6/1), fine to coarse CLAYEY DPT 50 / 60 S2 organic staining. SAND, wet [SP]. 6.35-10.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine SANDY CLAY with 0.0 1045.0 trace iron and organic staining, moist ICLI. 1040.0 1035.0 1030.0

LITHOLOGY LEGEND



Fill (made ground) USCS Poorly-graded Sand (SP)



USCS Low Plasticity Clay



USCS Low Plasticity Sandy Clay (CLS)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson

PLUNGE:-90

PROJECT NO.: 103-87305 HOLE DEPTH: 10

DEPTH OF SOIL DRILL: 10 DEPTH OF ROCK CORE:



BOREHOLE LOG: MW-02/GP-03

BOREHOLE LOG: IVIVV-U2/GP-U3

BOREHOLE LOCATION: Jefferson, IA

COORDINATES: N: 3473471.97 E: 4685903.39

DRILLING METHOD: Direct Push

GROUND SURFACE ELEV.: 1050.81 DATUM: N/A START DATE/TIME: 11/20/2010 10:45:00 AM

END DATE/TIME: 11/20/2010 12:15:00 AM

CORING METHOD: N/A DRILL RIG: 6600 PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 35 DEPTH OF SOIL DRILL: 35 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

SAMPLE INFORMATION Graphica Sample No. or Run No. % Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Log Rec. Discontinuity Data Graphic Construction PID Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil **GRAVEL FILL** Steel flush mount with Soft, dark gray, CLAY with trace 1050.0 locking cap. Sand. 0.0-0.25 ft-bgs: GRAVEL FILL 0.0-0.75 ft-bgs: 0.25-4.0 ft-bgs: Soft, dark gray (N3), CLAY, trace fine Sand, damp [CL]. Cement seal. 4.0-5.0 ft-bgs: Very soft, light olive gray (5Y 6/1), SANDY CLAY with some DP1 S1 38 / 60 0.75-4.0 ft-bgs: 0.0 Bentonite chips. Silt and trace iron and organic staining, moist [CL]. 4.0-10.0 ft-bgs: Filter Very soft to stiff, light olive gray to medium dark gray, SANDY CLAY with iron and organic sand pack (20/40 sand). staining. 5.0-10.0 ft-bgs: 1045.0 1.5-inch pre-packed 5.0-6.0 ft-bgs: Very soft, light olive gray (5Y 6/1), SANDY CLAY with some PVC well screen. Silt and trace iron and organic staining, moist [CL].
6.0-10.0 ft-bgs: Very soft, light olive gray (5Y 6/1), SANDY CLAY with S2 32 / 60 0.0 some Silt and some iron staining, moist [CL]. 1040.0 10.0-11.0 ft-bgs: Very soft, light olive gray (5Y 6/1), SANDY CLAY with some Silt and some iron staining, **S**3 DP 16 / 60 moist [CL]. 0.0 11.0-15.0 ft-bgs: Very soft, olive gray (5Y 5/4), SANDY CLAY with trace iron staining, damp [CL]. 1035.0 15.0-20.0 ft-bgs: Stiff, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand and trace iron DPT 12 / 60 0.0 staining, moist [CL]. 1030.0 20.0-22.0 ft-bgs: Stiff, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand and trace iron staining, moist [CL].
22.0-25.0 ft-bgs: Stiff, medium to dark gray (N4), SANDY CLAY with little S5 DPT 24 / 60 0.0 fine to coarse Sand, trace Gravel, and trace iron staining, moist [CL]. LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) USCS Low Plasticity Clay (CL) Fill (made ground) USCS Poorly-graded Sand (SP)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOG: MW-02/GP-03

PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 35 DEPTH OF SOIL DRILL: 35 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473471.97 E: 4685903.39 GROUND SURFACE ELEV.: 1050.81 DATUM: N/A START DATE/TIME: 11/20/2010 10:45:00 AM END DATE/TIME: 11/20/2010 12:15:00 AM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

						SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1025.0 _	Very soft to stiff, light olive gray to medium dark gray, SANDY CLAY with iron and organic staining.		S6	DPT	0.0	55 / 60	25.0-29.0 ft-bgs: Stiff, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand, trace Gravel, and trace iron staining, moist [CL]. 29.0-29.5 ft-bgs: Very soft, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand, trace Gravel, and trace iron staining, moist [CL]. 29.5-30.0 ft-bgs: Stiff, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand, trace Gravel, and trace iron staining, moist [CL].		
1020.0 _			S7	DPT	0.0	36 / 60	30.0-34.7 ft-bgs: Hard, medium to dark gray (N4), SANDY CLAY with little fine to coarse Sand, trace Gravel, and trace iron staining, dry [CL]. 34.7-34.9 ft-bgs: loose, light olive gray (5Y 5/6), medium SAND, dry [SP]. 34.9-35.0 ft-bgs: Hard, dark greenish gray (5GY 4/1), CLAY and SILT with little fine to coarse Sand, trace fine Gravel, dry [CL].	~	
1015.0 _	Loose SAND LENS Very soft to stiff, light olive gray to medium dark gray, SANDY CLAY with iron and organic staining.	vivini							
1010.0 _									
-									
LITH	HOLOGY LEGEND Fill (made ground USCS Poorly-grad (SP)				USCS (CL)	Low Plastici	ty Clay USCS Low Plasticity Sandy Clay (CLS)		

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOG: MW-03/GP-04

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473712.19 E: 4685345.59 GROUND SURFACE ELEV.: 1050.94
DATUM: N/A
START DATE/TIME: 11/20/2010 1:35:00 PM
END DATE/TIME: 11/20/2010 1:45:00 PM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 10 DEPTH OF SOIL DRILL: 10 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

	H: N/A PLUNGE:-90						010 1:45:00 PM		
						SAM	PLE INFORMATION	-	
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
- - - -	Soft, dark to olive gray, CLAY with trace Sand. Soft to stiff, light olive gray, SANDY CLAY with iron and		S1	DPT	0.0	42 / 60	0.0-2.5 ft-bgs: Soft, dark gray (N3), CLAY, trace fine Sand, damp [CL]. 2.5-4.0 ft-bgs: Soft, light olive gray (5Y 6/1), CLAY, trace fine Sand, damp [CL]. 4.0-5.0 ft-bgs: Soft, light olive gray (5Y 6/1), SANDY CLAY with some Silt, trace iron and organic staining, moist [CL].		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Cement seal. 0.75-3.0 ft-bgs: Bentonite chips. 3.0-10.0 ft-bgs: Filter sand pack (20/40 sand).
	organic staining.		S2	DPT	0.0	50 / 60	5.0-7.0 ft-bgs: Soft, light olive gray (5Y 6/1), SANDY CLAY with some Silt, trace iron and organic staining, moist-wet [CL]. 7.0-8.0 ft-bgs: Firm, light olive gray (5Y 6/1), SANDY CLAY with some fine to coarse Sand, trace Gravel, trace iron and organic staining, moist [CL]. 8.0-10.0 ft-bgs: Striff, light olive gray (5Y 6/1), SANDY CLAY with some fine to coarse Sand, trace Gravel, trace iron and organic staining, moist [CL].		4.0-9.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
1040.0									
					¥		,	e.	
035.0									
									·
1030.0									

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOG: MW-04/GP-05

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473471.13 E: 4685362.38 GROUND SURFACE ELEV.: 1049.9

DATUM: N/A START DATE/TIME: 11/20/2010 2:05:00 PM END DATE/TIME: 11/20/2010 2:15:00 PM

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DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphica Sample No. or Run No. Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Log Rec. Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil Soft, dark to olive gray, CLAY Steel flush mount with with trace Sand. locking cap. 0.0-3.5 ft-bgs: Soft, dark gray (N3), CLAY, trace fine Sand, damp [CL]. 0.0-0.75 ft-bgs: 3.5-4.0 ft-bgs: Very soft, light olive gray (5Y 6/1), CLAY, trace fine Sand, Cement seal. 45 / 60 moist [CL]. S1 0.75-3.0 ft-bgs: 0.0 6/1), fine to medium SANDY CLAY with some Silt, trace iron and organic Bentonite chips. 3.0-10.0 ft-bgs: Filter sand pack (20/40 staining, moist [CL]. Soft, light olive gray, SANDY CLAY with iron and organic 1045.0_ staining. SAND LENS 4.0-9.0 ft-bgs: 1.5-inch pre-packed PVC Soft, light olive gray, SANDY CLAY with iron and organic well screen. 5.0-10.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine to medium SANDY CLAY DPT 55 / 60 0.0 with some Silt, trace iron and organic staining, moist [CL]. 1040.0 1035.0-1030.0-1025.0 LITHOLOGY LEGEND USCS Poorty-graded Sand (SP) USCS Low Plasticity Clay (CL) USCS Low Plasticity Sandy Clay (CLS)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 10 DEPTH OF ROCK CORE:

HOLE DEPTH: 10

AZIMUTH: N/A



BOREHOLE LOG: MW-05/GP-06

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473144.28 E: 4685429.86 GROUND SURFACE ELEV.: 1051.53

DATUM: N/A START DATE/TIME: 11/20/2010 2:35:00 PM END DATE/TIME: 11/20/2010 2:45:00 PM PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Soil Sample Description Graphica Sample No. or Run No. Att Depth Elev. (mdd) Log Rec./. LITHOLOGY DESCRIPTION Well Well Construction Discontinuity Data Graphic PID Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Soft, dark to olive gray, CLAY 0.0-1.5 ft-bgs: Firm, dark gray (N3), Steel flush mount with with trace Sand. CLAY, trace fine Sand, damp [CL]. 1.5-2.5 ft-bgs: Firm, light olive gray (5Y locking cap. 6/1), fine to medium SANDY CLAY 1050.0 0.0-0.75 ft-bgs: Soft to firm, light olive gray, SANDY CLAY with iron and with some Silt, damp [CL]. 2.5-4.75 ft-bgs: Firm, light olive gray (5Y 6/1), fine to medium SANDY Cement seal. organic staining. DPT S1 36 / 60 0.75-3.0 ft-bgs: 0.0 CLAY with some Silt, trace iron and Bentonite chips. organic staining, damp [CL]. 4.75-5.0 ft-bgs: Soft, light olive gray (5Y 3.0-10.0 ft-bgs: Filter 6/1), fine to medium SANDY CLAY sand pack (20/40 with some Silt, trace iron and organic sand). staining, moist [CL]. 5.0-5.5 ft-bgs: Loose, medium yellow brown (10 YR 4/2), fine to coarse SAND, trace Gravel, wet [SP]. SAND LENS 4.0-9.0 ft-bgs: 1.5-inch Soft to firm, light olive gray, SANDY CLAY with iron and pre-packed PVC well screen. 5.5-6.5 ft-bgs: Soft, light olive gray (5Y 6/1), fine to carse SANDY CLAY with organic staining. 1045.0 some Silt, moist [CL]. 6.5-6.6 ft-bgs: Fine to coarse SAND 44 / 60 S2 DPT 0.0 lense. 6.6-8.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine to carse SANDY CLAY with some Silt, moist [CL]. 8.0-10.0 ft-bgs: Firm, light olive gray (5Y 6/1), fine to carse SANDY CLAY with some Silt, moist-damp [CL]. 1040.0 1035.0 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Low Plasticity Sandy Clay (CLS) USCS Poorty-graded Sand (SP)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 10

DEPTH OF ROCK CORE:

HOLE DEPTH: 10

AZIMUTH: N/A



BOREHOLE LOG: MW-06/GP-07

-07 PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 10 DEPTH OF SOIL DRILL: 10 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90 BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473155.05 E: 4685603.48 GROUND SURFACE ELEV.: 1049.44 DATUM: N/A START DATE/TIME: 11/20/2010 3:00:00 PM END DATE/TIME: 11/20/2010 3:15:00 PM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

					272 202220	SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att.	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type. and Surface Description)	Well Graphic	Well Construction Information
1045.0	GRAVEL FILL Hard to soft, light olive gray, SANDY CLAY with iron and organic staining.		S1	DPT	0.0	55 / 60	0.0-0.5 ft-bgs: GRAVEL FILL. 0.5-1.0 ft-bgs: Hard, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, dry-damp [CL]. 1.0-4.75 ft-bgs: Soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL]. 4.75-5.0 ft-bgs: Firm, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL]. 5.0-6.0 ft-bgs: Firm, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL]. 6.0-7.5 ft-bgs: Soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL]. 7.5-7.8 ft-bgs: Very soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL]. 7.8-8.5 ft-bgs: Soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist-wet [CL]. 8.8-5.10-05: Stiff, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL]. 8.5-10.0 ft-bgs: Stiff, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL].		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Cement seal. 0.75-4.0 ft-bgs: Bentonite chips. 4.0-10.0 ft-bgs: Filter sand pack (20/40 sand). 5.0-10.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
1025.0	HOLOGY LEGEND						•	9	
LIIF	HOLOGY LEGEND Fill (made ground	1)			USCS Clay (Low Plastic CLS)	ity Sandy		

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOG: MW-07/GP-08

HOLE DI DEPTH (IT NO.: 103-87305 EPTH: 15 OF SOIL DRILL: 15 OF ROCK CORE: H: N/A PLUNGE:-90		GRO DATI STAF	UND JM: N RT D	SURF/ N/A ATE/TII	ACE ELE ME: 11/20 : 11/20/2		B METHOD: Direct Pu METHOD: N/A G: 6600	sh
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
- - - - 1045.0	Soft to firm, dark gray, CLAY with trace Sand. Soft to very stiff, light to medium olive gray, SANDY CLAY with iron and organic staining.		S 1	DPT	0.0	36 / 60	0.0-1.5 ft-bgs: Soft, dark gray (N3), CLAY with trace fine Sand, damp [CL]. 1.5-4.5 ft-bgs: Stiff-very stiff, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, damp [CL]. 4.5-5.0 ft-bgs: Stiff-very stiff, medium light gray (N6), fine SANDY CLAY with some Silt, damp [CL].		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Cement seal. 0.75-9.0 ft-bgs: Bentonite chips.
			S2	DPT	0.0	55 / 60	5.0-5.25 ft-bgs: Stiff-very stiff, medium light gray (N6), fine SANDY CLAY with some Silt, damp [CL]. 5.25-8.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, little iron staining and trace organic staining, damp [CL]. 8.0-10.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt, little iron staining and trace organic staining, damp [CL].		9.0-15.0 ft-bgs: Filter sand pack (20/40 sand).
- 1035.0			S3	DPT	0.0	54 / 60	10.0-11.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt, little iron staining and trace organic staining, damp [CL]. 11.0-14.5 ft-bgs: Very stiff, medium gray (N5), fine to coarse SANDY CLAY with some Silt, little iron staining and trace organic staining, damp [CL]. 14.5-14.75 ft-bgs: Loose, medium yellow brown (10YR 5/4), fine to medium SAND, moist-wet [SP].		10.0-15.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
-	SAND LENS Soft to very stiff, dark gray, SANDY CLAY with iron and organic staining.			6			14.75-15.0 ft-bgs: Very stiff, medium dark gray (N4), fine to coarse SANDY CLAY with some Silt, little iron staining and trace organic staining, damp [CL].		
- 1030.0 - -									
- 1025.0									
LITH	HOLOGY LEGEND USCS Low Plast (CL)	icity Clay		<u> </u>	USCS Clay (Low Plastic CLS)	ity Sandy USCS Poorty-graded Sand (SP)	L s	

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOG: MW-08/GP-09

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473628.35 E: 4685640.81 GROUND SURFACE ELEV.: 1049.61 DATUM: N/A START DATE/TIME: 11/21/2010 7:45:00 AM END DATE/TIME: 11/21/2010 8:00:00 AM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 10 DEPTH OF SOIL DRILL: 10 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

				SAM	PLE INFORMATION		
LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No. Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type. and Surface Description)	Well Graphic	Well Construction Information
Soft, dark gray, CLAY with trace Sand. Very soft to stiff, light to medium olive gray, SANDY CLAY with iron and organic staining.		S1 DPT	0.0	45 / 60	0.0-1.0 ft-bgs: Soft, dark gray (N3), CLAY with trace fine Sand, damp [CL]. 1.0-4.0 ft-bgs: Very soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, trace iron and organic staining, moist [CL]. 4.0-4.5 ft-bgs: Very soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, little iron and trace organic staining, moist [CL]. 4.5-4.7 ft-bgs: Fine to coarse SAND, moist-wet. 4.7-5.0 ft-bgs: Very soft, light olive gray		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Cement seal. 0.75-3.0 ft-bgs: Bentonite chips. 3.0-10.0 ft-bgs: Filter sand pack (20/40 sand).
Very soft to stiff, light to medium olive gray, SANDY CLAY with iron and organic staining. 1040.0		S2 DPT	0.0	55 / 60	(5Y 6/1), fine SÁNDY CLAY with some Silt, little iron and trace organic staining, moist [CL]. 5.0-6.0 ft-bgs: Very soft, light olive gray (5Y 6/1), fine SANDY CLAY with some Silt, little iron and trace organic staining, moist [CL]. 6.0-9.5 ft-bgs: Soft, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt, little iron and trace organic staining, moist [CL]. 9.5-10.0 ft-bgs: Stiff, medium gray (N5), fine to coarse SANDY CLAY with some Silt, some iron and trace organic staining, damp [CL].		4.0-9.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
1035.0	. 0						
1030.0							
1025.0 LITHOLOGY LEGEND USCS Low Pic (CL)	asticity Clay		USCS Clay (Low Plastic	ity Sandy USCS Poorty-graded Sand (SP)		-

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOG: MW-09/GP-10

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473180.95 E: 4685490.47 GROUND SURFACE ELEV.: 1049.39

START DATE/TIME: 11/21/2010 9:05:00 AM END DATE/TIME: 11/21/2010 9:40:00 AM

DATUM: N/A

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

AZIMUTH: N/A SAMPLE INFORMATION Soil Sample Description Graphica Sample No. Or Run No. Depth Elev. (mdd) LITHOLOGY DESCRIPTION Log Rec. Well Well Discontinuity Data Graphic Construction Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) PID Core Soil 0.0-0.25 ft-bgs: GRAVEL FILL. GRAVEL FILL 0.25-1.5 ft-bgs: Firm, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt and trace fine Steel flush mount with Soft to stiff, light to dark olive locking cap. gray, SANDY CLAY with iron and organic staining. 0.0-0.75 ft-bgs: gravel, trace iron and organic staining, damp [CL]. 1.5-4.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine to coarse SANDY CLAY Cement seal. S1 DPT 54 / 60 0.75-3.0 ft-bgs: 0.0 with some Silt and trace fine Gravel, Bentonite chips. trace iron and organic staining, damp-moist [CL]. 3.0-12.0 ft-bgs: Filter sand pack (20/40 4.0-5.0 ft-bgs: Stiff, light olive gray (5Y 1045.0 sand). 6/1), fine to coarse SANDY CLAY with some Silt and trace fine Gravel, trace iron and organic staining, damp-moist [CL]. 5.0-8.0 ft-bgs: Stiff, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt and trace fine Gravel, trace iron and organic staining, 7.0-12.0 ft-bgs: 48 / 60 damp-moist [CL]. 1.5-inch pre-packed S2 DPT 0.0 8.0-10.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine to coarse SANDY CLAY PVC well screen. with some Silt and trace fine Gravel, trace iron and organic staining, moist 1040.0 10.0-11.0 ft-bgs: Soft, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt and trace fine Gravel, trace iron and organic staining, moist [CL]. 11.0-14.0 ft-bgs: Stiff, light olive gray (5Y 6/1), fine to coarse SANDY **S**3 DPT 42 / 60 0.0 CLAY with some Silt and trace fine Gravel, trace iron and organic staining, damp-moist [CL]. 14.0-15.0 ft-bgs: Very stiff, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt and trace fine 1035.0 Gravel, some iron and trace organic staining, damp-moist [CL] 15.0-16.0 ft-bgs: Very stiff, light olive gray (5Y 6/1), fine to coarse SANDY CLAY with some Silt and trace fine Gravel, some iron and trace organic staining, damp-moist [CL].

16.0-20.0 ft-bgs: Very stiff, medium dark gray (N4), fine to coarse SANDY CLAY with some Silt and **S4** 42 / 60 0.0 trace fine Gravel, some iron and trace organic staining, damp-dry 1030.0 [CL] 1025.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) Fill (made ground)

DRILLING COMPANY: Matrix Environmental

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 20 DEPTH OF ROCK CORE:

HOLE DEPTH: 20



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473208.66 E: 4685430.75 GROUND SURFACE ELEV.: 1049.24 DATUM: N/A

START DATE/TIME: 3/29/2011 8:45:00 AM END DATE/TIME: 3/29/2011 11:05:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. /Att Soil Sample Description Or Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec.// or Rec. Well Well Discontinuity Data Graphic Construction PID Core (Depth, Dip. Angle From Core Axis, Type. and Surface Description) Information Soil 0.5-1.0 ft-bgs: Firm, dark gray (N3), Concrete Steel flush mount with CLAY, trace fine Sand, damp. Firm, dark gray (N3), CLAY, trace 1.0-2.5 ft-bgs: Soft, light olive gray (5Y 5/2), fine SANDY CLAY, some Silt, locking cap. fine Sand, damp Very soft to stiff, light olive gray (5Y 5/2) to medium yellow 0.6 trace iron and organic staining, 0.0-1.0 ft-bgs: damp-moist. 2.5-3.0 ft-bgs: Soft, light olive gray (5Y 5/2), fine SANDY CLAY, some Silt, Concrete seal. brown (10YR 5/4), fine SANDY 48 / 54 CLAY, some Silt, trace iron 1 DP 1.0-1.5 ft-bgs: and organic staining, moist. trace fine Gravel, iron and organic Granular Bentonite. staining, damp-moist. 3.0-4.0 ft-bgs: Very soft, light olive gray (SY 5/2), fine SANDY CLAY, some 1.7 1.5-12.0 ft-bgs: Clean, fine to coarse sand 1045.0 Silt, trace fine Gravel, iron and filter organic staining, moist. 4.0-5.0 ft-bgs: Soft, moderate yellow 2.0-12.0 ft-bgs: brown (10YR 5/4), fine to medium 1.5-inch pre-packed PVC well screen SANDY CLAY, some Silt, trace fine with filter (20/40 Gravel, iron and organic staining, 1.4 damp.
5.0-5.5 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to medium SANDY CLAY, some Sift, trace fine sand). DPT 2 54 / 60 Gravel, iron and organic staining, 1.1 5.5-7.0 ft-bgs: Very soft, moderate 1040.0 yellow brown (10YR 5/4), fine to medium SANDY CLAY, some Silt, trace fine Gravel, iron and organic staining, moist. 7.0-9.0 ft-bgs: Soft-firm, moderate yellow brown (10YR 5/4), fine to medium SANDY CLAY, some Silt, 1.4 trace fine Gravel, iron and organic 12.0-15.0 ft-bgs: staining, damp. 9.0-10.0 ft-bgs: Firm, moderate yellow 3 DP. 32 / 60 Collapsed hole brown (10YR 5/4), fine to medium SANDY CLAY, some Silt, trace fine Gravel, iron and organic staining, 1.0 damp. 10.0-12.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to medium SANDY CLAY, some Sitt, trace fine 1035.0 Gravel, iron and organic staining, damp. 12.0-14.5 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to medium SANDY CLAY, some Silt, trace fine Gravel, iron and organic staining, damp. 14.5-15.0 ft-bgs: Stiff, medium dark gray (N4), fine to medium SANDY CLAY, some Silt, trace fine Gravel, iron and organic staining, damp. 1030.0 1025.0 LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Low Plasticity Sandy Clay (CLS) Concrete

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson

PLUNGE:-90

PROJECT NO.: 103-87305

DEPTH OF SOIL DRILL: 15

DEPTH OF ROCK CORE:

HOLE DEPTH: 15

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473158.1 E: 4685534.48 GROUND SURFACE ELEV.: 1049.79 DATUM: N/A

START DATE/TIME: 3/29/2011 11:15:00 AM END DATE/TIME: 3/29/2011 12:10:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

AZIMUTH: N/A PLUNGE:-90 SAMPLE INFORMATION Graphical Log % Sample No. or Run No. Soil Sample Description Depth Elev. Type (mdd) LITHOLOGY DESCRIPTION Rec. Well Well Discontinuity Data Graphic Construction Information PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Firm, dark yellow brown (10YR 4/2), CLAY and GRAVEL, 0.0-1.0 ft-bgs: Firm, dark yellow brown Steel flush mount with (10YR 4/2), CLAY and GRAVEL, locking cap. moist. [FILL] firm to stiff, medium yellow brown (10YR 5/4) to medium dark moist. [FILL] 1.0-2.5 ft-bgs: Stiff, moderate yellow 1.7 0.0-0.75 ft-bgs: brown (10YR 5/4), fine to coarse Concrete seal SANDY CLAY, some Silt, some iron gray (N4), fine SANDY CLAY, and organic staining, damp-moist. some Silt, some iron and 58 / 60 1 0.75-1.0 ft-bgs: Clean, 2.5-3.5 ft-bgs: Stiff, moderate yellow organic staining, damp-moist. brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, iron and fine to coarse sand. 1.4 organic staining, little light gray (N7) 1.0-2.5 ft-bgs: Granular Bentonite mottling, damp-moist. 3.5-4.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse 1045.0 2.5-13.5 ft-bgs: Clean, SANDY CLAY, some Silt, iron and fine to coarse sand organic staining, little light gray (N7) mottling, damp-moist. 4.0-5.0 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, iron and 3.0-13.0 ft-bgs: 1.5-inch pre-packed 21 PVC well screen organic staining, little light gray (N7) with filter (20/40 2 50 / 60 mottling, moist.

5.0-7.0 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to coarse sand). 1.3 SANDY CLAY, some Silt, iron and organic staining, little light gray (N7) mottling, moist.
7.0-7.5 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace fine 1040.0 Gravel, iron and organic staining, little light gray (N7) mottling, damp. 7.5-10.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse 3 DPT 42/42 2.0 SANDY CLAY, some Silt, trace fine Gravel, iron and organic staining, 13.0-13.5 ft-bgs: damp.

10.0-12.5 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace fine Collapsed hole. Gravel, iron and organic staining, 1035.0 damp. 12.5-13.5 ft-bgs: Stiff, medium dark gray (N4), fine to medium SANDY CLAY, some Silt, little iron and organic staining, damp. 1030.0 1025.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) Fill (made ground) DRILLING COMPANY: Matrix Environmental LOGGED BY: Joshua Nasrallah LOGGED BY DATE: 4/12/2011

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

DEPTH OF SOIL DRILL: 13.5 DEPTH OF ROCK CORE:

HOLE DEPTH: 13.5

CHECKED BY: James S. Peace CHECKED BY DATE: 5/13/2011



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473148.59 E: 4685712.93 GROUND SURFACE ELEV.: 1048.76 DATI IM: N/A

START DATE/TIME: 3/29/2011 12:45:00 PM END DATE/TIME: 3/29/2011 1:45:00 PM PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Soil Sample Description Sample No. or Run No. Graphica /Att Depth Elev. (mdd) Rec. LITHOLOGY DESCRIPTION Log Well Well Discontinuity Data Construction Graphic PID Information Core (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil 0.0-1.0 ft-bgs: Concrete Concrete 1.0-1.25 ft-bgs: Stiff, dark yellow brown (10YR 4/2), fine to medium SANDY Steel flush mount with locking cap. Stiff, dark yellow brown (10YR 4/2), fine SANDY CLAY, some CLAY, some Silt, trace iron and 0.0-0.75 ft-bgs: organic staining, moist. Concrete seal. Silt, trace iron and organic 1.25-1.75 ft-bgs: Loose, moderate staining, moist. yellow brown (10YR 5/4), fine to DPT 36 / 48 1 Loose, medium yellow brown (10YR 5/4), fine CLAYEY 22 0.75-1.0 ft-bgs: Clean, medium CLAYEY SAND, moist. 1.75-2.25 ft-bgs: Very soft, moderate yellow brown (10YR 5/4), fine to fine to coarse sand. SAND, moist 1045.0 Firm to stiff, medium yellow brown (10YR 5/4) to medium 1.0-2.5 ft-bgs: Granular Bentonite. medium CLAYEY SAND and Silt, moist. dark gray (N4), fine to medium SANDY CLAY, trace iron and 2.25-5.0 ft-bqs: Firm, moderate yellow brown (10YR 5/4), fine to medium 2.5-13.0 ft-bgs: Clean, organic staining, trace fine to SANDY CLAY, trace iron and organic fine to coarse sand medium sand seam (<0.5 cm), staining, trace fine to medium sand seam (<0.5 cm), moist. moist. 5.0-6.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to medium SANDY CLAY, little iron and organic 3.0-13.0 ft-bgs: 1.5-inch pre-packed PVC well screen. staining, moist. 6.0-10.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to medium DPT 2 30 / 60 2.3 SANDY CLAY, iron and organic 1040.0 staining, moist. 10.0-12.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to medium 1.5 SANDY CLAY, iron and organic staining, moist.

12.0-13.0 ft-bgs: Stiff, medium dark gray (N4), fine to medium SANDY CLAY, iron and organic staining, 3 Ub. 36 / 36 0.8 moist. 1035.0 1030.0 1025.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) 9 6 4 Concrete USCS Clavey Sand (SC)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson

PLUNGE:-90

PROJECT NO.: 103-87305

DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

HOLE DEPTH: 13

AZIMUTH: N/A



PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473150.08 E: 4685780.62 GROUND SURFACE ELEV.: 1048.55

DATUM: N/A START DATE/TIME: 3/29/2011 2:00:00 PM END DATE/TIME: 3/29/2011 2:50:00 PM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att.	Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
- - - 1045.0	Concrete Soft to stiff, medium yellow brown (10YR 5/4) to medium dark gray (N4), SANDY CLAY, some Silt, little iron and organic staining, trace light gray (N7) mottling, moist.		1	DPT	1.1	55 / 60	0.0-0.4 ft-bgs: Concrete 0.4-2.5 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, little iron and organic staining, trace light gray (N7) mottling, moist. 2.5-5.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, some iron and organic staining, little light gray (N7) mottling, moist.		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-1.0 ft-bgs: Clean, fine to coarse sand. 1.0-2.5 ft-bgs: Granular Bentonite.
- - - 040.0			2	DPT	2.2	30 / 60	5.0-5.5 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, some iron and organic staining, little light gray (N7) mottling, moist. 5.5-7.5 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, some iron and organic staining, moist. 7.5-9.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, some iron and organic staining, moist. 9.0-10.0 ft-bgs: Firm, moderate yellow		2.5-13.0 ft-bgs: Clean, fine to coarse sand filter.3.0-13.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
-			3	DPT	2.8	26 / 36	brown (10YR 5/4) fine to coarse SANDY CLAY, some Silt, some iron and organic staining, some medium dark gray (N4) mottling, moist. 10.0-13.0 ft-bgs: Stiff, medium dark gray (N4), fine to coarse SANDY CLAY, some Silt, some medium dark gray (N4) mottling, moist.		
035.0									
- - - -									
025.0	HOLOGY LEGEND								

GOLDER INSPECTOR: Joshua Janzen

LOGGED BY DATE: 4/12/2011 CHECKED BY: James S. Peace CHECKED BY DATE: 5/13/2011



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473151.65 E: 4685836.52 GROUND SURFACE ELEV.: 1048.24 DATUM: N/A

START DATE/TIME: 3/29/2011 3:05:00 PM END DATE/TIME: 3/29/2011 4:00:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphica Sample No. Or Run No. Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Log Rec./. Well Well Discontinuity Data Graphic Construction PID Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Concrete Steel flush mount with Very soft to frim, medium yellow 0.0-0.4 ft-bgs: Concrete 0.4-2.5 ft-bgs: Very soft, moderate yellow brown (10YR 5/4), fine to locking cap. brown (10YR 5/4), fine to coarse SANDY CLAY, some 1.1 0.0-0.75 ft-bgs: Silt, little iron and organic coarse SANDY CLAY, some Silt, little iron and organic staining, trace light Concrete seal. staining, trace light gray (N7) mottling, moist. 52 / 60 gray (N7) mottling, moist. 1 0.75-1.0 ft-bgs: Clean, 2.5-5.0 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, little iron fine to coarse sand. 1045 0 1.0 1.0-3.0 ft-bgs: Granular Bentonite. and organic staining, trace light gray (N7) mottling, moist. 3.0-13.0 ft-bgs: 5.0-9.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace fine 1.5-inch pre-packed PVC well screen. Gravel, little iron and organic 1.6 staining, trace light gray (N7) mottling, moist. 9.0-9.5 ft-bgs: Very soft, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, 2 DP. 58 / 60 1040.0 trace fine Gravel, little iron and 1.4 organic staining, wet. 9.5-10.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace fine Gravel, little iron and organic staining, moist.

10.0-11.5 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace fine Gravel, little iron and organic 3 UD. 34 / 36 2.1 staining, moist. 11.5-12.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse 1035.0 SANDY CLAY, some Silt, trace fine Gravel, and iron and organic staining, medium dark gray (N4) mottling, moist. 12.0-13.0 ft-bgs: Firm, medium dark gray (N4), fine to coarse SANDY CLAY, some Silt, trace fine Gravel, medium dark gray (N4) mottling, moist. 1030.0 1025.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) Concrete

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

HOLE DEPTH: 13

AZIMUTH: N/A



PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90 BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473346.3 E: 4685811.61 GROUND SURFACE ELEV.: 1050.66 DATUM: N/A

START DATE/TIME: 3/29/2011 4:15:00 PM END DATE/TIME: 3/29/2011 5:45:00 PM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphica Sample No. or Run No. Soil Sample Description Att Depth Elev. (mdd) LITHOLOGY DESCRIPTION Log Rec. Well Well Discontinuity Data Graphic Construction PID Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Stiff, grayish black (N2), SILTY CLAY, some roots and 1 1/2 Steel flush mount with 0.0-0.5 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, some roots and 1050.0 locking cap. organics, moist.
Stiff, grayish black (N2), SILTY
CLAY, little fine Sand, light 0.2 organics, moist. 0.0-0.75 ft-bas: 0.5-3.5 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, little fine Sand, moist. Concrete seal. olive gray (5Y 5/2) mottling, moist 3.5-4.0 ft-bgs: Stiff, grayish black (N2), 44 / 60 0.75-1.0 ft-bqs: Clean, SILTY CLAY, little fine Sand, light olive gray (5Y 5/2) mottling, moist. 4.0-5.0 ft-bgs: Soft, light olive gray fine to coarse sand. 0.2 1.0-2.5 ft-bgs: (5Y 5/2), fine SANDY CLAY, some Granular Bentonite. Very soft to stiff, light olive gray Silt, trace iron staining, moist. (5Y 5/2) to medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, trace iron 2.5-13.0 ft-bgs: Clean, 5.0-6.0 ft-bgs: Soft, light olive gray (5Y 5/2), fine SANDY CLAY, some Silt, trace iron staining, moist.
6.0-8.0 ft-bgs: Very soft, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, little fine to coarse sand 1045.0 staining, moist. 3.0-13.0 ft-bgs: 1.0 1.5-inch pre-packed PVC well screen. 2 55 / 60 iron staining and trace organic staining, moist. 8.0-10.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse 09 SANDY CLAY, some Silt, little iron staining and trace organic staining, moist. 1040.0 10.0-13.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, little iron 3 DP. 36 / 36 2.1 staining and trace organic staining, 1035.0 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) USCS Silt (ML) 7114. Topsoil LOGGED BY: Joshua Nasrallah LOGGED BY DATE: 4/12/2011 CHECKED BY: James S. Peace DRILLING COMPANY: Matrix Environmental DRILLER: Gary Golder GOLDER INSPECTOR: Joshua Janzen CHECKED BY DATE: 5/13/2011

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473313.72 E: 4685811.66 GROUND SURFACE ELEV.: 1050.64 DATUM: N/A

START DATE/TIME: 3/30/2011 8:15:00 AM END DATE/TIME: 3/30/2011 9:35:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphica Sample No. Or Run No. Soil Sample Description Depth Elev. LITHOLOGY DESCRIPTION mdd) Rec. Log Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil 0.0-0.5 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, some roots and Stiff, grayish black (N2), SILTY 11/2 1 Steel flush mount with CLAY, some roots and 1050.0 organics, moist. locking cap. organics, moist. Stiff, grayish black (N2), SILTY 0.5-2.5 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, little fine Sand, moist. 2.5-3.0 ft-bgs: Stiff, grayish black (N2), 1.9 0.0-0.75 ft-bgs: CLAY, little fine Sand, light Concrete seal. olive gray (5Y 5/2) mottling, SILTY CLAY, little fine Sand, light 58 / 60 0.75-1.0 ft-bgs: Clean, olive gray (5Y 5/2) mottling, moist. 3.0-3.5 ft-bgs: Soft, light olive gray (5Y 5/2), fine SANDY CLAY, some Silt, fine to coarse sand. Soft to stiff, light olive gray (5Y 5/2), fine SANDY CLAY, some 1.3 1.0-2.5 ft-bgs: Granular Bentonite. trace iron and organic staining, Silt, trace iron and organic moist staining, some medium yellow brown (10YR 5/4) mottling, 3.5-5.0 ft-bgs: Soft, light olive gray (5Y 5/2), fine SANDY CLAY, some Silt, 2.5-13.0 ft-bgs: Clean, trace iron and organic staining, some fine to coarse sand 1045.0 moderate yellow brown (10YR 5/4) mottling, moist.

5.0-9.0 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace iron 3.0-13.0 ft-bgs: 2.3 1.5-inch pre-packed PVC well screen. 2 58 / 60 and organic staining, some light olive gray (5Y 5/2) mottling, moist. 7.5 ft-bgs: >1 cm zone of very soft, wet 3.1 8.9 ft-bgs: >3 cm zone of very soft, wet soil. 9.0-10.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace iron 1040.0 and organic staining, some light olive gray (5Y 5/2) mottling, moist 10.0-11.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, trace iron 3 ner 30 / 36 4.6 and organic staining, some light olive gray (5Y 5/2) mottling, moist. 11.0-13.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, iron and organic staining, some light olive gray (5Y 5/2) mottling, moist 1035.0 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) USCS Silt (ML) Topsoil

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

HOLE DEPTH: 13

AZIMUTH: N/A



AZIMUT	OF ROCK CORE: H: N/A PLUNGE:-90		END			A 1800 ST 100 ST 100 ST	11 10:35:00 AM PLE INFORMATION		
Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
050.0	Stiff, grayish black (N2), SILTY CLAY, some roots and organics, moist. Soft, grayish black (N2), SILTY CLAY, little fine Sand, moist. Loose, medium yellow brown (10YR 5/4), fine to coarse SAND, moist. Stiff, grayish black (N2), SILTY CLAY, little fine to medium Sand, light olive gray (5Y 5/2) mottling, moist. Firm to stiff, light olive gray (5Y		1	DPT	2.1	- 50 / 60	0.0-1.0 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, some roots and organics, moist. 1.0-1.5 ft-bgs: Soft, grayish black (N2), SILTY CLAY, little fine Sand, moist. 1.5-2.0 ft-bgs: Loose, moderate yellow brown (10YR 5/4), fine to coarse SAND, moist. 2.0-2.75 ft-bgs: Stiff, grayish black (N2), SILTy CLAY, little fine to medium Sand, light olive gray (5Y 5/2) mottling, moist. 2.75-3.0 ft-bgs: Stiff, ligth olive gray (5Y 5/2), fine SANDY CLAY, some Silt,		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-1.0 ft-bgs: Clear fine to coarse sand 1.0-2.5 ft-bgs: Granular Bentonite 2.5-13.0 ft-bgs: Clear
	5/2) to moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, trace organic staining, moist.		2	DPT	11.6	- 54 / 60	5/2, line SANDT CLAT, sortie Sili, trace organic staining, moist. 3.0-5.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, little iron and organic staining, some olive gray (5Y 5/2) mottling, moist. 5.0-7.5 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, little iron and organic staining, some olive gray (5Y 5/2) mottling, moist. 7.5-8.5 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, little iron and		fine to coarse sand filter. 3.0-13.0 ft-bgs: 1.5-inch pre-packer PVC well screen.
040.0 - - -			3	DPT	2.7	30 / 36	organic staining, some olive gray (5Y 5/2) mottling, moist. Grayish blue (SPB 5/2) discoloration, odor. 8.5-10.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, iron and organic staining, some olive gray (5Y 5/2) mottling, moist. 10.0-13.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, iron and organic		
			u		ū.		staining, some olive gray (5Y 5/2) mottling, moist.		
030.0									

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 12 DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473227.53 E: 4685850.88 GROUND SURFACE ELEV.: 1049.61 DATUM: N/A START DATE/TIME: 3/30/2011 10:50:00 AM END DATE/TIME: 3/30/2011 12:10:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE BECERATION Concrete Concrete Lose, medium yellow brown (10YK 54), first be coarse SITI cyting black (NC) SLTY CLAY, sits fire Sand, trace rorr starring, most. Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow brown (10YK 54), first be coarse Set it is stiff, medium yellow (20		I	т —	T				DI E 11/2001/1/2011	
Loose, medium yellow brown (1797 84), fine to coarse SAND, moist. Series and project brown (1797 84), fine to coarse SAND, moist. Series and project brown (1797 84), fine to Sand, read- series 84, some ion and organic staming, finose is girl (1797 84), fine staming, finose is girl dive girly (1797 82), fine staming, finose is girl dive girly (1797 82), fine staming, finose is girl dive girly (1797 82), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girl dive girly (1797 84), fine staming, finose is girly dive girly (1797 84), fine staming, finose is girly dive girly (1798 84), fine staming, finose is girly dive girly (1798 84), fine staming, finose is girly dive girly (1798 84), fine staming, finose is girly dive girly (1798 84), fine staming, finose is gi	Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Туре	PID (ppm)	ec./Att. or Rec. %	Soil Sample Description or Discontinuity Data	Construction
TOWN (1975) in hothing, noted set with the coalines said fills of the coali	- - - 1045.0	Loose, medium yellow brown (10YR 5/4), fine to coarse SAND, moist. Stiff, grayish black (N2), SILTY CLAY, little fine Sand, trace iron staining, moist. Soft to stiff, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron and organic staining, trace light			DPT		44 / 60	0.5-0.75 ft-bgs: Loose, moderate yellow brown (10YR 5/4), fine to coarse SAND, moist. 0.75-1.5 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, little fine Sand, moist. 1.5-2.5 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, little fine Sand, trace iron staining, moist. 2.5-3.0 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, little fine Sand, trace iron staining, trace moderate yellow	locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-1.0 ft-bgs: Clean, fine to coarse sand. 1.0-1.5 ft-bgs: Granular Bentonite.
organic staining, trace light olive gray (5/52) mottling, moist. 6.5-8.0 ft-bgs: Stiff, moderate yellow brown (10YR 54), fine SANDY CLAY, some Sit, some iron and organic staining, trace light olive gray (5/52) mottling, moist. 8.0-10.0 ft-bgs: Stiff, moderate yellow brown (10YR 54), fine SANDY CLAY, some Sit, and iron and organic staining, trace light olive gray (6/52) mottling, moist. 1035.0 1035.0 LITHOLOGY LEGEND LUCK Weil-graded Sand SSC Weil-graded Sand SSC Weil-graded Sand SSC Weil-graded Sand SSC Weil-graded Sand USCS Stif (ML)	- - - -			2	DPT		55 / 60	3.0-5.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron and organic staining, trace light olive gray (5Y 5/2) mottling, moist. 5.0-6.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron and organic staining, trace light olive gray (5Y 5/2) mottling, moist. 6.0-6.5 ft-bgs: Soft, moderate yellow	fine to coarse sand filter. 2.0-12.0 ft-bgs: 1.5-inch pre-packed
1035.0 1035.0 LITHOLOGY LEGEND LITHOLOGY LEGEND LUSCS Well-graded Sand (SWL) Concrete Concrete CLAY, some Silt, and iron and organic staning, trace light olive gray (5Y 5/2) mottling, moist. 10.0-12.0 ft-bgs. Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, and iron and organic stight olive gray (5Y 5/2) mottling, moist.	1040.0 			3	DPT	2.7	22 / 24	organic staining, trace light olive gray (5Y 5/2) mottling, moist. 6.5-8.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron and organic staining, trace light olive gray (5Y 5/2) mottling, moist. 8.0-10.0 ft-bgs: Stiff, moderate yellow	
1025.0 LITHOLOGY LEGEND Concrete USCS Well-graded Sand USCS Silt (ML)	- 1035.0 - -							CLAY, some Silt, and iron and organic staining, trace light olive gray (5Y 5/2) motifing, moist. 10.0-12.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, and iron and organic staining, trace light olive gray	
LITHOLOGY LEGEND Concrete USCS Well-graded Sand (SW) USCS Silt (ML)	- 1030.0 _ -								
Clay (CLS)	W ESTATE OF THE STATE OF THE ST	Concrete USCS Low Plasti	city Sandy			USCS (SW)	Well-graded	d Sand USCS Sitt (ML)	

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 12 DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473290.59 E: 4685723.36 GROUND SURFACE ELEV.: 1050.73
DATUM: N/A
START DATE/TIME: 3/30/2011 12:30:00 PM
END DATE/TIME: 3/30/2011 1:40:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

LITHOLOGY DESCRIPTION	Graphical Log	e No.	Type	Ē.	tt. %	PLE INFORMATION Soil Sample Description	Well	M-B
LITHOLOGY DESCRIPTION	raphical Log	e No.	/pe	Ê	Att.	Soil Sample Description	Molf	MAZ-B
	O	Sample No. Or Run No.	7	PID (ppm)	Soil Rec./Att. or Core Rec. %	Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Graphic	Well Construction Information
Stiff, dark yellow brown (10YR 4/2), SILTY CLAY, some Silt, some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little light olive gray (5Y 4/2) mottling, moist.		1	DPT	0.9	- 58 / 60	0.0-0.75 ft-bgs: Stiff, dark yellow brown (10YR 4/2), SILTY CLAY, some Silt, some fine to coarse Sand, trace gravel, moist. 0.75-2.5 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little light olive gray (5Y 4/2) mottling, moist. 2.5-5.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, trace light olive		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-1.0 ft-bgs: Clean fine to coarse sand 1.0-1.5 ft-bgs: Granular Bentonite. 1.5-12.0 ft-bgs: Clean
		2	DPT	83.5	30 / 60	5.0-5.5 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, trace light olive gray (5Y 4/2) mottling, moist. 5-9.0 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, trace light olive gray (5Y 4/2) mottling, moist. 9.0-10.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, trace iron and		fine to coarse sand filter. 2.0-12.0 ft-bgs: 1.5-inch pre-packet PVC well screen.
		3	DPT	620	22 / 24	organic staining, trace light olive gray (5Y 4/2) mottling, moist. 10.0-12.0 ft-bgs: Stiff, moderate yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, trace iron and organic staining, trace light olive gray (5Y 4/2) mottling, moist.		
							×	
		.00						
	some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little light olive gray (5Y 4/2) mottling.	some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little organic staining, ittle organic staining, moist.	some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little light olive gray (5Y 4/2) mottling, moist.	some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little light olive gray (5Y 4/2) mottling, moist. 1 DPT 3 DPT 3 DPT	some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little light olive gray (5Y 4/2) mottling, moist. 1 DPT 0.7	some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 5/4), fine SANDY CLAY, some Silt, some iron staining, little organic staining, little light clive gray (5Y 4/2) mottling, moist. 2 DPT 83.5 30 / 60 3 DPT 620 22 / 24	some fine to coarse Sand, trace gravel, moist. Soft to firm, medium yellow brown (10YR 54), fine SANDY CLAY, some Silt, some iron staining, little light olive gray (5Y 4/2) mottling, moist. 0.7 0.7 S8 / 60 little organic staining, little light olive gray (5Y 4/2) mottling, moist staining, little light olive gray (5Y 4/2) mottling	some fine to coarse Sand, trace gravel, moist. Soft to time, medium yellow brown (10YR 64), fine SANDY CLAY, some Silt, some ron statining, title light older gray (SY 4/2) mottling, moist. 1 DPT 58 / 60 1 DPT 620 2 DPT 83.5 DPT 620 3 DPT 620 Some fine to coarse Sand, trace gravel, moist. Some fine to coarse Sand, trace gravel, moist. 5 / 75-2.5 ft bgs. Firm, moderate yellow brown (10YR 54), fine SANDY CLAY, some Silt, some iron staining, stitle organic staining, trace light olive gray (SY 4/2) mottling, moist. 2 DPT 83.5 DPT 620 2 Z / Z4 3 DPT 620 3 DPT 620 3 DPT 620 Some fine to coarse Sand, trace gravel, moist. 5 -5 0 ft bgs. Firm, moderate yellow brown (10YR 54), fine SANDY CLAY, some Silt, sace leght olive gray (SY 4/2) mottling, moist. 5 -5 0 ft bgs. Soft, moderate yellow brown (10YR 54), fine SANDY CLAY, some Silt, sace leght olive gray (SY 4/2) mottling, moist. 5 -5 0 ft bgs. Soft, moderate yellow brown (10YR 54), fine SANDY CLAY, some Silt, race leght olive gray (SY 4/2) mottling, moist. 5 -5 0 ft bgs. Soft, moderate yellow brown (10YR 54), fine SANDY CLAY, some Silt, race leght olive gray (SY 4/2) mottling, moist. 5 -5 0 ft bgs. Soft, moderate yellow brown (10YR 54), fine SANDY CLAY, some Silt, race in on and organic staining, trace light olive gray (SY 4/2) mottling, moist.

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473246.16 E: 4685692.14 GROUND SURFACE ELEV.: 1050.39 DATUM: N/A

START DATE/TIME: 3/30/2011 1:45:00 PM END DATE/TIME: 3/30/2011 2:45:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphica Sample No. or Run No. /Att Soil Sample Description Depth Elev. (mdd) Rec.// LITHOLOGY DESCRIPTION Log Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Gravel Fill 1050.0 Steel flush mount with Soft to firm, grayish black (N2) locking cap. fine to coarse SANDY/SILTY 0.0-0.25 ft-bgs: Gravel Fill 0.25-2.5 ft-bgs: Firm, grayish black (N2), fine to coarse SANDY CLAY, CLAY, some Silt, moist. 0.2 0.0-0.75 ft-bgs: Concrete seal. some Silt, moist. 2.5-5.0 ft-bgs: Soft, light olive gray (5Y 5/2), SILTY CLAY, little, iron staining, 50 / 60 DPT 1 0.75-1.0 ft-bgs: Clean, fine to coarse sand. 4.25 ft-bgs: < 1cm fine Sand seam, 0.3 1.0-1.5 ft-bgs: wet. Granular Bentonite. 1.5-12.0 ft-bgs: Clean, 5.0-5.5 ft-bgs: Loose, moderate yellow Loose, medium yellow brown fine to coarse sand 1045.0 (10YR 5/4), fine to coarse brown (10YR 5/4), fine to coarse SAND, wet. SAND, wet. 5.5-6.0 ft-bgs: Soft, moderate yellow Soft to firm, medium yellow brown (10YR 5/4), fine to coarse 2.0-12.0 ft-bgs: 0.6 brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, little iron 1.5-inch pre-packed SANDY CLAY, some Silt, little PVC well screen. staining, trace organic staining, iron staining, trace organic DPT 53 / 60 2 staining, moist. 6.0-7.0 ft-bgs: Firm, moderate yellow brown (10YR 5/4), fine to coarse SANDY CLAY, some Silt, little iron 0.2 staining, trace organic staining, moist. 7.0-10.0 ft-bgs: Soft, moderate yellow brown (10YR 5/4), fine to coarse 1040.0 SANDY CLAY, some Silt, little iron 3 DPT 21/24 staining, trace organic staining, 1.0 brown (10YR 4/2), fine to coarse
SANDY CLAY, some Silt, some iron staining, trace organic staining, moist. 1035.0 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Silty USCS Well-graded Sand ••••• Fill (made ground) Clay (CL-ML) USCS Low Plasticity Sandy Clay (CLS)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE:

HOLE DEPTH: 12

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473266.47 E: 4685590.13 GROUND SURFACE ELEV.: 1050.37 DATUM: N/A START DATE/TIME: 3/30/2011 3:55:00 PM END DATE/TIME: 3/30/2011 4:40:00 PM

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DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

1050.0 Concrete Very stiff to stiff, black (N1), CLAY, odor, moist. 1 DPT 54 / 60 1 DPT 54 / 60 1 DPT 54 / 60 2 DPT 119 33 / 60 2 DPT 119 33 / 60 3 DPT 105.0 Concrete 1 DPT 54 / 60 1 DPT	AZIMOTI	H. N/A FLONGE90	1	END	DAI			DIE INFORMATION	1	
Very stiff to stiff, black (N1), CLAY, cord, most. 1	Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)		Soil Sample Description Or Discontinuity Data		Construction
1045.0 2 DPT 119 33 / 60	1050.0	Very stiff to stiff, black (N1), CLAY, odor, moist. Very soft to firm, medium bluish gray (5B 5/1), fine SANDY		1	DPT		- 54 / 60	0.5-2.0 ft-bgs: Very stiff, black (N1), CLAY, odor, moist. 2.0-4.0 ft-bgs: Stiff, black (N1), CLAY, odor, moist. 4.0-5.0 ft-bgs: Firm, medium bluish gray (5B 5/1), fine SANDY CLAY,		locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-1.0 ft-bgs: Clean, fine to coarse sand. 1.0-1.5 ft-bgs: Granular Bentonite. 1.5-12.0 ft-bgs: Clean,
1040.0 Firm, medium dark gray (NA), fine to coarse SANDY CLAY, some Silt, odor, moist. 3 DPT 10.5 24 / 24 9.8-10.0 ft-bgs: Firm, medium dark gray (NA), fine to coarse SANDY CLAY, some Silt, odor, moist. 1035.0 1035.0 LTTHOLOGY LEGEND.	1045.0 — — — —			2	DPT	119	33 / 60	gray (5B 5/1), fine SANDY CLAY, some Silt, odor, moist. 9.4-9.8 ft-bgs: Loose, medium bluish gray (5B 5/1), fine SAND, odor, wet. 9.8-10.0 ft-bgs: Firm, medium dark gray (N4), fine to coarse SANDY		fine to coarse sand filter. 2.0-12.0 ft-bgs: 1.5-inch pre-packed
1030.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy USCS Low Plasticity Sandy	1040.0	5/1), fine SAND, odor, wet. Firm, medium dark gray (N4), fine to coarse SANDY CLAY,		3	DPT	10.5	24 / 24	gray (N4), fine to coarse SANDY CLAY, some Silt, odor, moist. 10.0-12.0 ft-bgs: Firm, medium dark gray (N4), fine to coarse SANDY		
LITHOLOGY LEGEND USCS Low Plasticity Clay USCS Low Plasticity Sandy	1035.0									
USCS Low Plasticity Clay USCS Low Plasticity Sandy	1030.0									
	LITE	C. V. S. S. S.					S Low Plastic			

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 12 DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE:

AZIMUTH: N/A

PLUNGE:-90



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473266.6 E: 4685613.66 GROUND SURFACE ELEV.: 1050.32 DATUM: N/A

START DATE/TIME: 3/30/2011 2:50:00 PM END DATE/TIME: 3/30/2011 3:50:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log /Att. Soil Sample Description Sample No. or Run No. Depth Elev. (mdd) Or Rec.// LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil Concrete 1050.0 Well Not Installed Very stiff to stiff, black (N1), CLAY, odor, moist. 2.1 47 / 60 1 75.3 Very soft to firm, medium bluish gray (5B 5/1), fine SANDY CLAY, some Silt, odor, moist. 1045.0 28 2 54 / 60 9.8 Loose, medium bluish gray (5B 5/1), fine SAND, odor, wet. Firm, medium dark gray (N4), fine to coarse SANDY CLAY, 1040.0 DPT 0/24 3 some Silt, odor, moist. N/A 1035.0 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Low Plasticity Sandy Clay (CLS)

DRILLING COMPANY: Matrix Environmental

GOLDER INSPECTOR: Joshua Janzen

Concrete

USCS Poorly-graded Sand (SP)

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 12

PLUNGE:-90

DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE:

AZIMUTH: N/A



ZIMUTI	OF ROCK CORE: H: N/A PLUNGE:-90	_				: 3/30/20	2011 4:45:00 PM 11 5:45:00 PM PLE INFORMATION		
Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
050.0 _	Concrete Very stiff to stiff, black (N1), CLAY, odor, moist. Stiff, black (N1), SILTY CLAY,		1,	DPT	7.1	55 / 60	0.0-0.5 ft-bgs: Concrete 0.5-2.0 ft-bgs: Very stiff, black (N1), CLAY, odor, moist. 2.0-3.0 ft-bgs: Stiff, black (N1), CLAY, odor, moist. 3.0-5.0 ft-bgs: Stiff, black (N1), SILTY		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-1.0 ft-bgs: Clean fine to coarse sand
-	odor, moist.		3		5.3		CLAY, odor, moist.		1.0-1.5 ft-bgs: Granular Bentonite 1.5-12.0 ft-bgs: Clean
045.0 _ - -	Very soft to firm, medium bluish gray (5B 5/1), SILTY CLAY, odor, moist.		2	DPT	23.5	33 / 60	5.0-5.5 ft-bgs: Firm, medium bluish gray (5B 5/1), SILTY CLAY, odor, moist. 5.5-9.5 ft-bgs: Very soft, medium bluish gray (5B 5/1), SILTY CLAY, odor, moist. 9.5-10.0 ft-bgs: Loose, medium bluish gray (5B 5/1), fine to coarse SAND, odor, wet.		fine to coarse sand filter. 2.0-12.0 ft-bgs: 1.5-inch pre-packer PVC well screen.
 040.0 _ _	Loose, medium bluish gray (5B 5/1), fine to coarse SAND, odor, wet. Loose, medium bluish gray (5B 5/1), medium SILTY SAND, odor, wet. Firm, medium dark gray (N4), fine to coarse SANDY CLAY,		3	DPT	7.1	24 / 24	10.0-10.5 ft-bgs: Loose, medium bluish gray (5B 5/1), medium SILTY SAND, odor, wet. 10.5-12.0 ft-bgs: Firm, medium dark gray (N4), fine to coarse SANDY CLAY, some Silt, odor, moist.		
- - 035.0 _	some Silt, odor, moist.								
_ 030.0 _ _					a.				
_									

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473265.78 E: 4685542.41 GROUND SURFACE ELEV.: 1050.79

DATUM: N/A START DATE/TIME: 3/30/2011 5:50:00 PM END DATE/TIME: 3/30/2011 6:50:00 PM PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION % Graphica Sample No. Or Run No. Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Log Rec. Discontinuity Data Graphic Construction PD (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Soil Concrete imir i Steel flush mount with Very stiff to stiff, black (N1), CLAY, some iron staining, 1050.0 locking cap. 0.0-0.5 ft-bgs: Concrete 0.5-2.0 ft-bgs: Very stiff, black (N1), CLAY, moist. 2.0-3.0 ft-bgs: Stiff, black (N1), CLAY, 0.6 0.0-0.75 ft-bgs: Concrete seal. 3.0-4.0 ft-bgs: Stiff, olive black (5Y 2/1), SILTY CLAY, trace fine Sand, moist. 1 DPT 47 / 60 0.75-1.0 ft-bgs: Clean, fine to coarse sand. 4.0-5.0 ft-bgs: Stiff, olive black (5Y 2/1), SILTY CLAY, trace fine Sand, some 0.4 1.0-1.5 ft-bgs: iron staining, moist. Granular Bentonite. 1.5-12.0 ft-bgs: Clean, Very soft, olive gray (5Y 4/1), fine to medium SANDY CLAY. fine to coarse sand filter. 1045.0 5.0-6.0 ft-bgs: Very soft, olive gray (5Y 4/1), fine to medium SANDY CLAY, some Silt, trace iron staining, 2.0-12.0 ft-bgs: 0.5 Loose, medium bluish gray (5B 5/1), fine to coarse SILTY some Silt, trace iron staining, moist. 1.5-inch pre-packed 6.0-9.75 ft-bgs: Loose, medium bluish gray (5B 5/1), fine to coarse SILTY SAND, wet. PVC well screen. SAND, wet. 2 DPT 40 / 60 9.75-10.0 ft-bgs: Stiff, medium dark gray (N4), fine to coarse SANDY CLAY, some Silt, and iron staining, 4.8 Stiff, medium dark gray (N4), fine to coarse SANDY CLAY, some 10.0-10.5 ft-bgs: Stiff, medium dark gray (N4), fine to coarse SANDY CLAY, some Silt, and iron staining, 1040.0 Silt, and iron staining, moist. 3 DPT 24 / 24 0.3 moist 10.5-12.0 ft-bgs: Stiff, medium dark gray (N4), fine to coarse SANDY CLAY, some Silt, moist. 1035.0 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Sandy Clay (CLS) USCS Low Plasticity Clay (CL) Concrete USCS Silty Sand (SM)

DRILLING COMPANY: Matrix Environmental DRILLER: Gary

GOLDER INSPECTOR: Joshua Janzen

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

HOLE DEPTH: 12
DEPTH OF SOIL DRILL: 12
DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOG: MW-24 (MIP-20/SB-17) BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473483.34 E: 4685720.81 DRILLING N

GROUND SURFACE ELEV.: 1050.72

DATUM: N/A START DATE/TIME: 5/2/2012 END DATE/TIME: 5/2/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 18 DEPTH OF SOIL DRILL: 18 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

AZIMUTI	H: N/A PLUNGE:-90		END	DAT	E/ I IME	: 5/2/201			
					_		PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical	Sample No. or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Avis, Type, and Surface Description)	Well Graphic	Well Construction Information
1050.0	Concrete Compact, brown, medium to coarse SAND, little Gravel. Firm to stiff, gray to brown, SILTY CLAY, trace to little Sand, trace gravel, trace organics.			DPT	0.3	48 / 60	O.0-0.75 ft-bgs: Concrete O.75-1.25 ft-bgs: Compact, moderate brown, 5YR 3/4), medium to coarse subangular SAND, little fine to medium Gravel, moist (SW). 1.25-4.0 ft-bgs: Stiff, olive black (5Y 2/1), SILTY CLAY, trace fine to medium Sand, trace organics, moist (ML-CL). 4.0-5.0 ft-bgs: Firm, olive gray (5Y 4/1) SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 2.0-4.0 ft.		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-12.0 ft-bgs: Granular Bentonite.
1045.0 _	•						5.0-10.0 ft-bgs: Not Sampled.		
1040.0 _			2	DPT	0.7	56 / 60	10.0-14.0 ft-bgs: Stiff, medium gray (N5) mottled moderate yellowish brown (10YR 5/4), SILTY CLAY, little medium to coarse sand, trace fine gravel, slightly moist (ML-CL). 14.0-15.0 ft-bgs: Firm, medium dark gray (N4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 10.0-12.0 ft.		12.0-18.0 ft-bgs: Clean, fine to coarse sand filter. 13.0-18.0 ft-bgs: 1.5-inch pre-packed PVC well screen with filter (20/40
1035.0 _									sand).
1030.0									
LITH	HOLOGY LEGEND Concrete		·	· *•	uscs	Well-grade	d Sand USCS Low Plasticity Silty Clay (CL-ML)		
	ESTALL STREET		ئماً	لت	(SW)		Clay (CL-ML)		

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-25D (MIP-32/LIF-03/SB-13) BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473438.13 E: 4685731.44 GROUND SURFACE ELEV.: 1050.78 DATUM: N/A START DATE/TIME: 5/2/2012 END DATE/TIME: 5/2/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A

PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305: HOLE DEPTH: 29 DEPTH OF SOIL DRILL: 29 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

AZIMUT	H: N/A PLUNGE:-90		END	DAT	E/TIME	: 5/2/201			
			100	Т		SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Avis, Type, and Surface Description)	Well Graphic	Well Construction Information
1050.0 _	Concrete Firm to stiff, black to gray, SILTY CLAY, little to trace Sand, trace gravel, trace organics.		1	DPT	3.2	53 / 60	0.0-0.75 ft-bgs: Concrete 0.75-4.0 ft-bgs: Stiff, olive black (5Y 2/1), SILTY CLAY, trace medium to coarse Sand, trace organics, slightly moist (ML-CL). 4.0-5.0 ft-bgs: Firm, medium dark gray (N4), SILTY CLAY, little fine to medium Sand, trace fine Gravel, slightly moist (ML-CL). Sample collected 1.0-3.0 ft. Sample collected 4.0-6.0 ft.		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-23.0 ft-bgs: Granular Bentonite.
1045.0 _			2	DPT	22.1	54 / 60	5.0-10.0 ft-bgs: Firm, medium dark gray (N4), SILTY CLAY, little fine to medium Sand, trace fine Gravel, slightly moist (ML-CL).		
1040.0 _	Soft, gray, SILT, some Sand, some Clay. Firm to stiff, gray to brown, CLAYEY SILT to SILTY CLAY, little to trace Sand, little to trace gravel.		3	DPT	36.9	58 / 60	10.0-11.5 ft-bgs: Soft, medium dark gray (N4), SILT, some Clay, some fine to coarse Sand, wet (ML). 11.5-13.0 ft-bgs: Firm, medium dark gray (N4), CLAYEY SILT, little medium to coase Sand, trace fine Gravel, moist (ML-CL). 13.0-15.0 ft-bgs: Stiff, olive gray (5Y 4/1) mottled moderate brown (5YR 3/4) SILTY CLAY, trace medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sample collected 10.0-12.0 ft.		
1035.0 _			4	DPT	2.5	57 / 60	15.0-20.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, moist (ML-CL). Sample collected 16.0-18.0 ft.		
1030.0 _	,		5	DPT	6.7	43 / 60	20.0-24.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, moist (ML-CL). 24.0-25.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, little fine Gravel, trace medium to coarse Sand (ML-CL).		23.0-29.0 ft-bgs: Clean, fine to coarse sand filter.
LITH	HOLOGY LEGEND Concrete					Low Plastic CL-ML)	ty Silty USCS Silt (ML)		

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-25D (MIP-32/LIF-03/SB-13) BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473438.13 E: 4685731.44 DRILLING METHOD

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 29 DEPTH OF SOIL DRILL: 29 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-5 PLUNGE:-90

GROUND SURFACE ELEV.: 1050.78 DATUM: N/A START DATE/TIME: 5/2/2012

END DATE/TIME: 5/2/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 2 of 2

				, ,		SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1025.0 _	Firm to stiff, gray to brown, CLAYEY SILT to SILTY CLAY, little to trace Sand, little to trace gravel.		6	DPT	0.0	57 / 60	25.0-30.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, little fine Gravel, moist (ML-CL). Sample collected 26.0-28.0 ft.		23.0-29.0 ft-bgs: Clean, fine to coarse sand filter. 24.0-29.0 ft-bgs: 1.5-inch pre-packed PVC well screen with filter (20/40 sand).
1020.0 _								2	
1015.0 _									
1010.0 _						а			
1005.0 _	HOLOGY LEGEND								
£(1)	Concrete				Clay (Low Plastic CL-ML)	OSCO Sat (with)		
DRILLIN	IG COMPANY: Matrix Environmental				LC	GGED E	BY: JRT		- Carry

DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-25S (MIP 32/LIF-03/SB-13)

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473437.68 E: 4685727.64 GROUND SURFACE ELEV.: 1050.76 DATUM: N/A

START DATE/TIME: 5/2/2012 END DATE/TIME: 5/2/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 18 DEPTH OF SOIL DRILL: 18 DEPTH OF ROCK CORE: PLUNGE:-90 AZIMUTH: N/A

SAMPLE INFORMATION Soil Sample Description Graphica Att. Depth Elev. å (mdd) Rec./ Sample No Or Run No. LITHOLOGY DESCRIPTION Log Well Well Construction Discontinuity Data Graphic Information PID Core (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil Concrete 0.0-0.75 ft-bgs: Concrete 0.75-4.0 ft-bgs: Stiff, olive black (5Y 2/1), SILTY CLAY, trace medium to Steel flush mount with 1050.0 locking cap. Firm to stiff, black to gray, SILTY CLAY, little to trace Sand. 0.0-0.75 ft-bgs: coarse Sand, trace organics, slightly trace gravel, trace organics. moist (ML-CL). Concrete seal. 4.0-5.0 ft-bgs: Firm, medium dark gray (N4), SILTY CLAY, little fine to medium Sand, trace fine Gravel, 53 / 60 1 0.75-13.0 ft-bgs: 3.2 Granular Bentonite. slightly moist (ML-CL). Sample collected 1.0-3.0 ft. Sample collected 4.0-6.0 ft. 1045.0 5.0-10.0 ft-bgs: Firm, medium dark gray (N4), SILTY CLAY, little fine to DPT 54 / 60 22 1 medium Sand, trace fine Gravel, slightly moist (ML-CL). 10.0-11.5 ft-bgs: Soft, medium dark gray (N4), SILT, some Clay, some fine to coarse Sand, wet (ML). 11.5-13.0 ft-bgs: Firm, medium dark Soft, gray, SILT, some Sand, some Clay. 1040.0 gray (N4), ČLAYEY SILT, little Firm to stiff, gray to brown, CLAYEY SILT to SILTY CLAY, medium to coase Sand, trace fine Gravel, moist (ML-CL). DPT 58 / 60 little to trace Sand, little to 3 36.9 13.0-15.0 ft-bgs: Stiff, olive gray (5Y trace gravel. 4/1) mottled moderate brown (5YR 3/4) SILTY CLAY, trace medium to 13.0-19.0 ft-bgs: Clean, fine to coarse Sand, trace fine Gravel, moist coarse sand filter. (ML-CL). 14.0-19.0 ft-bgs: Sample collected 10.0-12.0 ft. 1.5-inch pre-packed PVC well screen with filter (20/40 1035.0 sand). 15.0-20.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, moist 57 / 60 2.5 (ML-CL). Sample collected 16.0-18.0 ft. 1030.0 20.0-24.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, moist (ML-CL). 5 43 / 60 24.0-25.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, little fine Gravel, 6.7 trace medium to coarse Sand (ML-CL). LITHOLOGY LEGEND USCS Low Plasticity Silty Clay (CL-ML) USCS Silt (ML) Concrete

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-25S (MIP 32/LIF-03/SB-13)

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473437.68 E: 4685727.64 GROUND SURFACE ELEV.: 1050.76 DATUM: N/A

START DATE/TIME: 5/2/2012 END DATE/TIME: 5/2/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 2 of 2

AZIMUTH: N/A SAMPLE INFORMATION Graphical Log Sample No. Or Run No. Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec./ Well Well Graphic Discontinuity Data Construction PID Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Firm to stiff, gray to brown, CLAYEY SILT to SILTY CLAY, 1025.0 little to trace Sand, little to trace gravel. 25.0-30.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, little fine Gravel, moist (ML-CL). 6 DPT 57 / 60 0.0 Sample collected 26.0-28.0 ft. 1020.0 1015.0 1010.0 1005.0 LITHOLOGY LEGEND USCS Low Plasticity Silty Clay (CL-ML) USCS Silt (ML)

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: MWD

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 18
DEPTH OF ROCK CORE:

HOLE DEPTH: 18

LOGGED BY DATE: 5/15/2012 CHECKED BY: ATK CHECKED BY DATE: 8/3/2012



BOREHOLE LOG: MW-26D (MIP-21/SB-14) BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473381.54 E: 4685687.58 DRILLING ME

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 25 DEPTH OF SOIL DRILL: 25 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

GROUND SURFACE ELEV.: 1050.78

DATUM: N/A START DATE/TIME: 5/2/2012 END DATE/TIME: 5/2/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

AZIMUTH	ł: N/A PLUNGE:-90		END	DAT	E/IIME	: 5/2/201			
				Т		SAM	PLE INFORMATION	-	
Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Avis, Type, and Surface Description)	Well Graphic	Well Construction Information
050.0							0.0-5.0 ft-bgs; Not Sampled.		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-19.0 ft-bgs: Granular Bentonite.
045.0	Firm to stiff, gray to brown, SILTY CLAY, little to trace Sand, trace gravel.		1	DPT	3.8	30 / 60	5.0-8.5 ft-bgs: Firm, light olive gray (5Y 6/1) and moderate yellowish brown (10YR 5/4), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, moist (ML-CL). 8.5-10.0 ft-bgs: Firm, light olive gray (5Y 6/1) and moderate yellowish brown (10YR 5/4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 7.0-9.0 ft.		
040.0			2	DPT	67.2	57 / 60	10.0-13.5 ft-bgs: Stiff, light olive gray (5Y 6/1) and moderate brown (5Y 3/4), SILTY CLAY, trace fine gravel, trace medium to coarse Sand, slightly moist (ML-CL). 13.5-15.0 ft-bgs: Stiff, medium dark gray (N4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 12.0-14.0 ft.		
335.0			·				15.0-20.0 ft-bgs: Not Sampled.		19.0-25.0 ft-bgs: Clean, fine to
030.0			3	DPT	2.6	48 / 60	20.0-25.0 ft-bgs: Stiff, medium dark gray (N4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 23.0-25.0 ft.		coarse sand filter. 20.0-25.0 ft-bgs: 1.5-inch pre-packe PVC well screen with filter (20/40 sand).

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



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PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 16 DEPTH OF SOIL DRILL: 16 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOG: MW-26S (MIP-21/SB-14)

BOREHOLE LOCATION: Jefferson, IA
COORDINATES: N: 3473379.38 E: 4685687.74
GROUND SURFACE ELEV.: 1050.72

DRILLING ME
CORING MET

DATUM: N/A START DATE/TIME: 5/2/2012 END DATE/TIME: 5/2/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

	1 20,102.00	Т					DI E INECDMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att.	PLE INFORMATION Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1050.0							0.0-5.0 ft-bgs: Not Sampled.		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-10.0 ft-bgs: Granular Bentonite.
1045.0	Firm to stiff, gray to brown, SILTY CLAY, little to trace Sand, trace gravel.		1	DPT	3.8	30 / 60	5.0-8.5 ft-bgs: Firm, light olive gray (5Y 6/1) and moderate yellowish brown (10YR 5/4), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, moist (ML-CL). 8.5-10.0 ft-bgs: Firm, light olive gray (5Y 6/1) and moderate yellowish brown (10YR 5/4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 7.0-9.0 ft.		
1040.0			2	DPT	67.2	57 / 60	10.0-13.5 ft-bgs: Stiff, light olive gray (5Y 6/1) and moderate brown (5Y 3/4), SILTY CLAY, trace fine gravel, trace medium to coarse Sand, slightly moist (ML-CL). 13.5-15.0 ft-bgs: Stiff, medium dark gray (N4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 12.0-14.0 ft.		10.0-16.0 ft-bgs: Clean, fine to coarse sand filter. 11.0-16.0 ft-bgs: 1.5-inch pre-packed PVC well screen with filter (20/40 sand).
1035.0							15.0-20.0 ft-bgs: Not Sampled.		
1030.0 _			3	DPT	2.6	48 / 60	20.0-25.0 ft-bgs: Stiff, medium dark gray (N4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 23.0-25.0 ft.		
LITH	HOLOGY LEGEND USCS Low Plastic Clay (CL-ML)	city Silty	•	•		•			

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-27 (MIP-30/LIF-15/SB-03)

SAMPLE INFORMATION

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473322.73 E: 4685551.9 GROUND SURFACE ELEV.: 1050.72

START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012 DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 15 DEPTH OF SOIL DRILL: 15 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

Sample No. Or Run No. Soil Sample Description Graphica Depth Elev. (mdd) LITHOLOGY DESCRIPTION Log Rec. Well Well Discontinuity Data Graphic Construction Information PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Concrete Steel flush mount with 1050.0 0.0-0.75 ft-bgs: Concrete locking cap. Compact, moderate brown, fine to coarse SAND, some Sitt. 0.75-1.25 ft-bgs: Compact, moderate brown (5YR 3/4), fine to coarse 0.0-0.75 ft-bgs: Firm to very stiff, black to gray, SAND, some silt, wet (SW). 1.25-5.0 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, little fine to Concrete seal. SILTY CLAY, some to trace Sand, trace Gravel. 1 49 / 60 15.5 0.75-9.0 ft-bas: medium Sand, trace organics, slight Granular Bentonite. odor, slightly moist (ML-CL). Sampled collected 2.0-4.0 ft. 1045.0 5.0-8.5 ft-bgs: Stiff, grayish black (N2), SILTY CLAY, little fine to medium Sand, trace organics, slight odor, slightly moist (ML-CL). 8.5-10.0 ft-bgs: Stiff, dark gray (5G 4/1), SILTY CLAY, trace fine gravel, trace fine to medium Sand, slightly 35 / 60 111.4 moist (ML-CL). 9.0-15.0 ft-bgs: Clean, Sampled collected 6.0-8.0 ft. fine to coarse sand 10.0-15.0 ft-bgs: 1040.0 1.5-inch pre-packed PVC well screen 10.0-15.0 ft-bgs: Very stiff, dark greenish gray (5G 4/1), mottled moderate brown (5YR 4/4), SILTY with filter (20/40 3 DP1 22 / 60 39 CLAY, some fine to coarse Sand, trace fine to medium Gravel, slightly moist (ML-CL). 15.0-16.25 ft-bgs: Firm, dark greenish gray (5G 4/1) and olive black (5Y 2/1), SILTY CLAY, some medium to 1035.0 coarse Sand, trace fine Gravel, odor, moist (ML-CL). 16.25-17.75 ft-bgs: Stiff, brownish gray (5YR 4/1), SILTY CLAY, trace DPT 55 / 60 313 medium to coarse Sand, slightly moist (ML-CL). 17.75-20.0 ft-bgs: Firm, greenish black (5GY 2/1) SILTY CLAY, trace medium to coarse sand, slightly moist (ML-CL). Sampled collected 16.0-18.0 ft. 1030.0

LITHOLOGY LEGEND

Concrete

USCS Well-graded Sand (SW)

36 / 60

0.5

20.0-25.0 ft-bgs: Firm, greenish black (5G 2/1), SILTY CLAY, trace medium to coarse Sand, moist. (ML-CL)

Sampled collected 22.0-24.0 ft.

USCS Low Plasticity Sitty Clay (CL-ML)

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



SAMPLE INFORMATION

BOREHOLE LOG: MW-28 (MIP-34/SB-02)

BOREHOLE LOCATION: Jefferson, IA
COORDINATES: N: 3473352.03 E: 4685743
GROUND SUFFACE ELEV.: 1050.8
DATI IM: NI/A

DATUM: N/A START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 18 DEPTH OF SOIL DRILL: 18 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

						SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and " Surface Description)	Well Graphic	Well Construction Information
1050.0 _	Concrete Compact, moderate brown, SILTY SAND. Firm to stiff, black to gray to brown, SILTY CLAY, little to trace Sand, trace Gravel.		ø	DPT	5.1	47 / 60	0.0-0.75 ft-bgs: Concrete 0.7-1.5 ft-bgs: Compact, moderate brown (5YR 3/4), medium to coarse, SILTY SAND, wet. 1.5-2.25 ft-bgs: Firm, olive black (5Y 2/1), SILTY CLAY, trace medium to coarse Sand, moist. 2.25-5.0 ft-bgs: Stiff, medium light gray (NG) mottled moderate yellowish brown (10YR 5/4), SILTY CLAY, little fine to medium Sand, trace fine Gravel, slightly moist (ML-CL).		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-12.0 ft-bgs: Granular Bentonite.
1045.0 _							5.0-13.0 ft-bgs: Not sampled.		12.0-18.0 ft-bgs: Clean, fine to coarse sand filter.
1035.0 _			2	DPT	548	60 / 60	13.0-18.0 ft-bgs: Stiff, dark gray (N3), SILTY CLAY, trace fine to medium Gravel, trace medium to coarse Sand, slightly moist (ML-CL). Sample collected 14.0-16.0 ft.		13.0-18.0 ft-bgs: 1.5-inch pre-packed PVC well screen with filter (20/40 sand).
1030.0 _							18.0-25.0 ft-bgs: Not sampled.		
LITH	HOLOGY LEGEND Concrete				USCS (SW)	Well-grade	d Sand USCS Low Plasticity Sity Clay (CL-ML)		

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-28 (MIP-34/SB-02)

BOREHOLE LOCATION: Jefferson, IA
COORDINATES: N: 3473352.03 E: 4685743
GROUND SURFACE ELEV.: 1050.8

DRILLING ME
CORING ME

DATUM: N/A START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012

PAGE 2 of 2

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

						SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %		Well Graphic	Well Construction Information
1025.0 _	Firm to stiff, black to gray to brown, SILTY CLAY, little to trace Sand, trace Gravel.		3	DPT	3.0	57 / 60	25.0-30.0 ft-bgs: Stiff, dark gray (N3), SILTY CLAY, trace fine Gravel, trace fine to medium Sand, slightly moist (ML-CL). Sample collected 28.0-30.0 ft.		
1020.0									
-									
-									
1015.0 _									
-									
-									
1010.0 _									
_									
-									
1005.0									
-									
-									
LITH	OLOGY LEGEND Concrete				USCS (SW)	Well-gradeo	USCS Low Plasticity Sity Clay (CL-ML)		

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 18 DEPTH OF SOIL DRILL: 18 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-

PLUNGE:-90



BOREHOLE LOG: MW-29 (MIP-03/LIF-02/SB-15)

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473290.58 E: 4685720.39 **GROUND SURFACE ELEV.: 1050.61**

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 21 DEPTH OF SOIL DRILL: 21 DEPTH OF ROCK CORE: PLUNGE:-90 AZIMUTH: N/A

DATUM: N/A START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. Att Soil Sample Description Depth Elev. (mdd) Well LITHOLOGY DESCRIPTION Well Rec. Discontinuity Data Graphic Construction PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Soil Steel flush mount with 1050.0 locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-15.0 ft-bgs: Granular Bentonite. 0.0-10.0 ft-bgs: Not Sampled. 1045.0 10.0-12.5 ft-bgs: Firm, moderate yellowish brown (10YR 5/4) mottled with moderate brown (5Y 3/4), SILTY Firm to stiff, brown to gray, SILTY CLAY, little to trace Sand, little 1040.0 to trace gravel. CLAY, trace fine gravel, trace medium to coarse Sand, moist (ML-CL) 2.5-14.25 ft-bgs: Firm, moderate yellowish brown (10YR 5/4) mottled with moderate brown (5Y 3/4), SILTY 977.3 | 58 / 60 | DPT CLAY, little fine gravel, little medium to coarse Sand, moist (ML-CL). 14.25-15.0 ft-bgs: Stiff, medium dark gray (N4) SILTY CLAY, little medium to coarse Sand, trace fine Gravel, 15.0-21.0 ft-bgs: moist (ML-CL). Clean, fine to 1035.0 coarse sand filter. Sampled collected 13.0-15.0 ft. 15.0-17.0 ft-bgs: Not Sampled. 16.0-21.0 ft-bgs: 1.5-inch pre-packed PVC well screen with filter (20/40 sand). 17.0-22.0 ft-bgs: Firm, medium dark gray (N4), SILTY CLAY, trace fine to medium Gravel, trace medium to 56 / 60 2 DP. 0.7 coarse Sand, moist (ML-CL). Sampled collected 19.0-21.0 ft. 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Silty Clay (CL-ML)

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-30 (MIP-05/LIF-17/SB-16) BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473267.46 E: 4685592.54 DRILLING METHO

GROUND SURFACE ELEV.: 1050.35

DATUM: N/A START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012

PAGE 1 of 2

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

								1	
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Type	PID (ppm)	Soil Rec./Att.	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1050.0							0.0-10.0 ft-bgs: Not Sampled.		Steel flush mount with locking cap. 0.0-0.75 ft-bgs: Concrete seal. 0.75-20.0 ft-bgs: Granular Bentonite.
1040.0	Stiff, gray, SILTY CLAY, little Sand, little to trace gravel.		1	DPT	0.5	56 / 60	10.0-15.0 ft-bgs: Stiff, medium dark gray (N4), SILTY CLAY, little medium to coarse Sand, trace fine Gravel, moist (ML-CL). Sampled collected 12.0-14.0 ft.		
1035.0			2	DPT	0.3	58 / 60	15.0-20.0 ft-bgs: Stiff, medium dark gray (N4), SILTY CLAY, little fine to medium Gravel, little medium to coarse Sand, moist (ML-CL). Sampled collected 18.0-20.0 ft.		
1030.0							20.0-22.0 ft-bgs: Not Sampled.		20.0-26.0 ft-bgs: Clean, fine to coarse sand filter. 21.0-26.0 ft-bgs: 1.5-inch pre-packed
-	2		3	DPT	0.6	58 / 60	22.0-27.0 ft-bgs: Stiff, medium dark gray (N4), SILTY CLAY, little fine to medium Gravel, little medium to coarse Sand, moist (ML-CL). Sampled collected 24.0-26.0 ft.		PVC well screen with filter (20/40 sand).
LITH	HOLOGY LEGEND USCS Low Plastic Clay (CL-ML)	city Silty							

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 26 DEPTH OF SOIL DRILL: 26 DEPTH OF ROCK CORE:

AZIMUTH: N/A

PLUNGE:-90



BOREHOLE LOG: MW-30 (MIP-05/LIF-17/SB-16) BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473267.46 E: 4685592.54 GROUND SURFACE ELEV.: 1050.35 DATI IM: NIA

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 26 DEPTH OF SOIL DRILL: 26 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

DATUM: N/A START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012

AZIMOTI	H. N/A FEOINGE:-90		LIND	DAI	L) I IIVIL	. 3/3/201			
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Туре	PID (ppm)	Soil Rec./Att.	PLE INFORMATION Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1025.0	Stiff, gray, SILTY CLAY, little Sand, little to trace gravel.		3	DPT	0.6	58 / 60			
-									
1020.0									
-									
1015.0									
1010.0			-						
-									
1005.0				2					
-									
LITH	HOLOGY LEGEND								
	HOLOGY LEGEND USCS Low Plas Clay (CL-ML)	sticity Silty							

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 18 DEPTH OF SOIL DRILL: 18
DEPTH OF ROCK CORE:
AZIMUTH: N/A PLUNGE:-90 BOREHOLE LOG: MW-31 (MIP-15/SB-01)

BOREHOLE LOCATION: Jefferson, IA
COORDINATES: N: 3473267.04 E: 4685852.18
GROUND SURFACE ELEV.: 1050.76

DRILLING ME
CORING ME

DATUM: N/A START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

Concrete				5/3/201	E/ I IIVIE	DAI	LIND		H: N/A PLUNGE:-90	AZIMUTI
Concrete Compact, moderate brown, medium to coarse SAND, Marked Description Concrete Compact, moderate brown, (medium to coarse SAND, Marked Description Marked Description Coarse SAND, Marked			INFORMATION	SAM						
1050.0 Compact, moderate brown. medium to coarse SAND. Stiff, olive black, SANDY SILT, some Sand. Stiff, olive black, SANDY SILT, some Sand. Very stiff to firm, gray to brown to black, SILTY CLAY, trace gravel, trace to some Sand, trace clay. 2 DPT 52.0 47 / 60 5 .0 -7.75 ft-bgs. Stiff, medium blash gray (SB 5/1), SILTY CLAY, store medium to coarse Sand, moist (ML-CL). Sampled collected 2 0-4.0 ft. 5 .0 -7.75 ft-bgs. Stiff, medium blash gray (SB 5/1), SILTY CLAY, interemedium Sand, slightly moist (ML-CL). Sampled collected 7 .0 -9.0 ft. 1040.0 1040.0 3 DPT 38.1 60 / 60 4 DPT 46.5 29 / 60 4 DPT 46.5 29 / 60 Locarde Sand, moist (ML-CL). 105 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 104 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 105 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 104 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 105 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 104 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 105 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 105 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 106 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 107 / 11 / 10 -11.0 ft-bgs. Stiff, motien medium sand, slightly moist (ML-CL). 10 -11.0 ft-bgs. Stiff, motien sequence shows the sequence sh	Vell truction mation	Graphic Cons	Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and	Soil Rec./Att. or Core Rec. %	PID (ppm)	Type	Sample No. Or Run No.	Graphical Log	LITHOLOGY DESCRIPTION	Depth Elev.
1045.0	cap. -bgs: e seal.	locking (0.0-0.75 ft Concret 0.75-12.0	7-2.25 ft-bgs: Compact, moderate brown (5YR 4/4), medium to coarse SAND, wet (SW). 25-3.5 ft-bgs: Stiff, olive black (5Y 2/1), SANDY SILT, some medium to coarse Sand, moist (SM). 5-5.0 ft-bgs: Stiff, olive gray (5Y 4/1), SILTY CLAY, some medium to coae e Sand, moist (ML-CL).	44 / 60	28.2	DPT	1		Compact, moderate brown, medium to coarse SAND. Stiff, olive black, SANDY SILT, some Sand. Very stiff to firm, gray to brown to black, SILTY CLAY, trace gravel, trace to some Sand,	1050.0 _
1040.0			gray (5B 5/1), SILTY CLAY, little medium Sand, slightly moist (ML-CL). 75-10.0 ft-bgs: Stiff, moderate yellowish brown (10YR 5/4), mottled medium light gray (NG) SILTY CLAY, trace medium Sand, slightly moist (ML-CL).	47 / 60	52.0	DPT	2		wace day.	1045.0 _ - -
1035.0 1035.0	ine to sand filter. ft-bgs: pre-packed ll screen	Clean, fi coarse s 13.0-18.0 1 1.5-inch PVC we	moderate yellowish brown (10YR 5/4) and medium light gray (NG), SILTY CLAY, trace medium Sand, slightly moist (ML-CL). 1.0-11.2 ft-bgs: Compact, grayish brown (5YR 3/2), medium to coarse SILTY SAND, trace Clay, wet (SM). 1.2-13.0 ft-bgs: Stiff, moderate yellowish brown (10 YR 5/4) mottled medium light gray (N6) and moderate brown (5YR 3/4) SILTY CLAY, trace medium Sand, trace fine	60 / 60	38.1	DPT	3			1040.0 _
- I8.0-20.0 it-bgs: Stiff, dark gray (N3), SILTY CLAY, trace medium to coarse Sand, slightly moist (ML-CL). Sampled collected 15.0-17.0 ft.		sand).	8.0-15.0 ft-bgs: Very stiff, moderate brown (5YR 3/4) and medium light gray (N6) mottled black (N1) SILTY CLAY, trace medium to coarse Sand, slightly moist (ML-CL). 6.0-18.0 ft-bgs: Firm, mottled olive gray (5Y 4/3) and medium gray (N5), SILTY CLAY, trace medium to coarse Sand, slightly moist (ML-CL). 8.0-20.0 ft-bgs: Stiff, dark gray (N3), SILTY CLAY, trace medium to coarse Sand, slightly moist (ML-CL).	29 / 60	46.5	DPT	4			1035.0 _
1030.0 5 DPT 3.1 42 / 60 SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, slightly moist (ML-CL).			0.0-25.0 ft-bgs: Stiff, dark gray (N3), SILTY CLAY, trace fine Gravel, trace medium to coarse Sand, slightly	42 / 60	3.1	DPT	5		y	1030.0 _

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: MWD



BOREHOLE LOG: MW-31 (MIP-15/SB-01)

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473267.04 E: 4685852.18 GROUND SURFACE ELEV.: 1050.76

DATUM: N/A START DATE/TIME: 5/3/2012 END DATE/TIME: 5/3/2012 •,

PAGE 2 of 2

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Sample No. or Run No. Soil Sample Description Att Depth Elev. Type (mdd) LITHOLOGY DESCRIPTION Rec. Well Well Log Discontinuity Data Graphic Construction Information BB (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Very stiff to firm, gray to brown to black, SILTY CLAY, trace 1025.0 gravel, trace to some Sand, trace clay. 25.0-30.0 ft-bgs: Stiff, dark gray (N3), SILTY CLAY, trace fine Gravel, trace 6 36 / 60 7.2 medium to coarse Sand, slightly moist. 30.0-33.0 ft-bgs: Stiff, dark gray (N3), SILTY CLAY, trace fine Gravel, trace 1020.0 medium to coarse Sand, slightly moist. 33.0-34.0 ft-bgs: Harde, pale yellowish brown (10YR 6/2), SANDY SILT, little 7 48 / 48 0.5 Clay, trace fine Gravel, dry. Hard, yellowish brown, SANDY SILT, little Clay, trace Gravel. Sampled collected 31.0-33.0 ft. 1015.0 1010.0 1005.0 LITHOLOGY LEGEND USCS Well-graded Sand USCS Silty Sand (SM) Concrete

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

USCS Low Plasticity Silty Clay (CL-ML)

DIVILLEIX. G. Paquetti

GOLDER INSPECTOR: MWD

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 18

PLUNGE:-90

DEPTH OF SOIL DRILL: 18 DEPTH OF ROCK CORE:

AZIMUTH: N/A

LOGGED BY: JRT LOGGED BY DATE: 5/15/2012 CHECKED BY: ATK CHECKED BY DATE: 8/3/2012

USCS Sandy Silt (MLS)



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473470.41 E: 4685562.21 GROUND SURFACE ELEV.: 1050.8

DATUM: N/A START DATE/TIME: 11/10/2012 10:48:00 AM END DATE/TIME: 11/10/2012 11:18:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. or Run No. /Att. Soil Sample Description Depth Elev. (mdd) I Rec./ or 3 Rec. LITHOLOGY DESCRIPTION Well Well Or Discontinuity Data Graphic Construction PID (Core Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 3.0-13.0 ft-bgs: 1.5-inch pre-packed PVC well screen. No samples taken. 1045.0 1040.0 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13

DEPTH OF SOIL DRILL: 13
DEPTH OF ROCK CORE:
AZIMUTH: N/A PLUNGE:-90



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473370.18 E: 4685559.08 GROUND SURFACE ELEV.: 1050.77 DATUM: N/A

START DATE/TIME: 11/10/2012 11:22:00 AM END DATE/TIME: 11/10/2012 12:08:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Rec./Att. or e Rec. % Sample No. Or Run No. Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Discontinuity Data Construction Graphic (Depth, Dip. Angle From Core Axis, Type, and Surface Description) PID (Information Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand 3.0-13.0 ft-bgs: 1.5-inch pre-packed No samples taken. PVC well screen. 1045.0 1040.0 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13

DEPTH OF SOIL DRILL: 13
DEPTH OF ROCK CORE:
AZIMUTH: N/A PLUNGE:-90

LOGGED BY: MRH LOGGED BY DATE: 11/30/2012 CHECKED BY: NSC CHECKED BY DATE: 1/28/2013

Golder Associates

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473462.12 E: 4685627.74 GROUND SURFACE ELEV.: 1050.84 DATUM: N/A

START DATE/TIME: 11/13/2012 9:33:00 AM END DATE/TIME: 11/13/2012 10:00:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. or Run No. /Att. Soil Sample Description Depth Elev. (mdd) or Rec. LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction PID Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Steel flush mount with 1050.0 locking cap. 0.5-1.0 ft-bgs: Sand. 1.0-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 3.0-13.0 ft-bgs: 1.5-inch pre-packed PVC well screen. No samples taken. 1045.0 1040.0 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13

PLUNGE:-90

DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473323.61 E: 4685603.22

GROUND SURFACE ELEV.: 1050.76 DATUM: N/A

START DATE/TIME: 11/10/2012 12:05:00 PM END DATE/TIME: 11/10/2012 1:45:00 PM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305
HOLE DEPTH: 13
DEPTH OF SOIL DRILL: 13
DEPTH OF ROCK CORE: PLUNGE:-90 AZIMUTH: N/A

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec./ Rec. Well Well Discontinuity Data Graphic Construction PID (Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter 3.0-13.0 ft-bgs: No samples taken. 1.5-inch pre-packed PVC well screen. 1045.0 1040.0 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473298.22 E: 4685631.45 GROUND SURFACE ELEV.: 1050.79 DATUM: N/A

START DATE/TIME: 11/10/2012 1:42:00 PM END DATE/TIME: 11/10/2012 3:10:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. or Run No. Soil Sample Description or Depth Elev. (mdd) Rec.// Or Rec. LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction PID (Information Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-13.5 ft-bgs: Bentonite Seal No samples taken. 1045.0 1040.0 13.5-20.0 ft-bgs: Clean, fine to coarse sand filter. 15.0-20.0 ft-bgs: 1.5-inch pre-packed PVC well screen. 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

HOLE DEPTH: 20
DEPTH OF SOIL DRILL: 20
DEPTH OF ROCK CORE:
AZIMUTH: N/A PLUNG



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473298.34 E: 4685634.17 GROUND SURFACE ELEV.: 1050.77

DATUM: N/A START DATE/TIME: 11/10/2012 2:15:00 PM END DATE/TIME: 11/10/2012 3:15:00 PM PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Rec./Att. or e Rec. % Sample No. Or Run No. Soil Sample Description Or PID (ppm) Depth Elev. LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction Information (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Core Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 3.0-13.0 ft-bgs: No samples taken. 1.5-inch pre-packed PVC well screen. 1045.0 1040.0 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO:: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

PLUNGE:-90

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473321.97 E: 4685497.68 GROUND SURFACE ELEV.: 1050.33 DATUM: N/A START DATE/TIME: 11/13/2012 12:30:00 PM END DATE/TIME: 11/13/2012 1:03:00 PM

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

AZIMUT	H: N/A PLUNGE:-90		END	DAI	E/ I IME		012 1:03:00 PM	,	
						SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1045.0	HOLOGY LEGEND						No samples taken.		Steel flush mount with locking cap. 0.5-1.0 ft-bgs: Sand. 1.0-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 3.0-13.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
LITH	HOLOGY LEGEND								

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473260.07 E: 4685460.75 GROUND SURFACE ELEV.: 1050.01 DATUM: N/A

START DATE/TIME: 11/13/2012 10:56:00 AM END DATE/TIME: 11/13/2012 11:45:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. Soil Sample Description /Att Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec./ or Rec. Well Well Discontinuity Data Graphic Construction PID (Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil 1050.0 Steel flush mount with locking cap. 0.5-1.0 ft-bgs: Sand. 1.0-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 3.0-13.0 ft-bgs: 1045.0-No samples taken. 1.5-inch pre-packed PVC well screen. 1040.0-1035.0 1030.0-LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

AZIMUTH: N/A

PLUNGE:-90



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473224.81 E: 4685542.24 GROUND SURFACE ELEV.: 1049.82 DATUM: N/A

START DATE/TIME: 11/10/2012 4:30:00 PM END DATE/TIME: 11/10/2012 6:05:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Rec./Att. or e Rec. % Soil Sample Description Or Discontinuity Data Sample No. or Run No. Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Construction Graphic PID (Information (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil Steel flush mount with locking cap. 1-1.5 ft-bgs: Sand. 1.5-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 1045.0 3.0-13.0 ft-bgs: No samples taken. 1.5-inch pre-packed PVC well screen. 1040.0 1035.0_ 1030.0_ 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

AZIMUTH: N/A

PLUNGE:-90



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473151.98 E: 4685516 GROUND SURFACE ELEV.: 1050.38 DATUM: N/A START DATE/TIME: 11/13/2012 3:45:00 PM

END DATE/TIME: 11/14/2012 10:30:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Rec./Att. or e Rec. % Sample No. Or Run No. Soil Sample Description Or Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Core Soil 1050.0 Steel flush mount with locking cap. 1-1.5 ft-bgs: Sand. 1.5-13.0 ft-bgs: Bentonite Seal No samples taken. 1045.0 1040.0 13.0-20.0 ft-bgs: Clean, fine to coarse sand filter. 15.0-20.0 ft-bgs: 1.5-inch pre-packed PVC well screen. 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

HOLE DEPTH: 20 DEPTH OF SOIL DRILL: 20 DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473242.68 E: 4685657.91 GROUND SURFACE ELEV.: 1047.09

DATUM: N/A START DATE/TIME: 11/13/2012 10:12:00 AM END DATE/TIME: 11/13/2012 10:45:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. or Run No. Type % Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec.// or 3 Rec. Well Well Or Discontinuity Data Graphic Construction PID (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Information Core Soil Steel flush mount with locking cap. 0.3-0.5 ft-bgs: Sand. 1045.0 0.5-1.0 ft-bgs: Bentonite Seal 1.0-12.0 ft-bgs: Clean, fine to coarse sand 2.0-12.0 ft-bgs: 1.5-inch pre-packed PVC well screen. No samples taken. 1040.0 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 12

DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

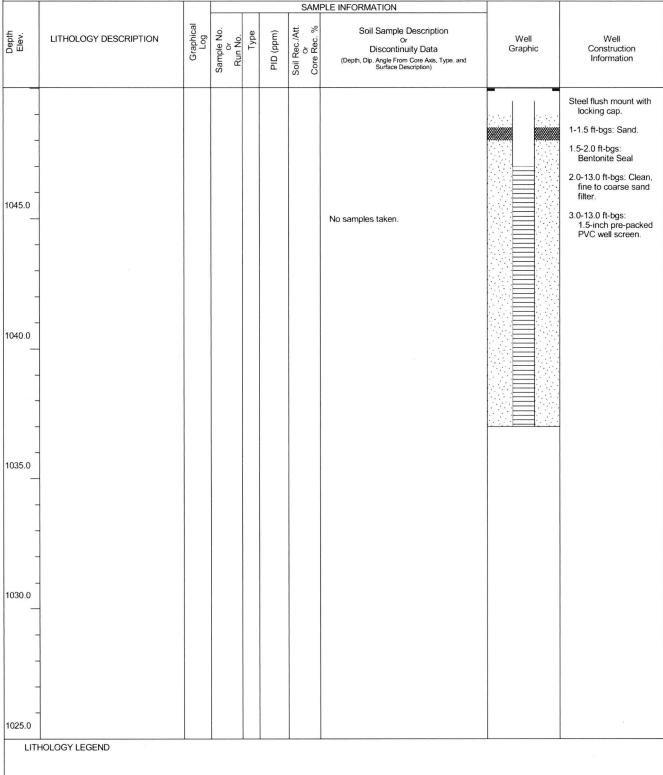


BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473212.97 E: 4685629.19 GROUND SURFACE ELEV.: 1049.47

DATUM: N/A START DATE/TIME: 11/10/2012 10:05:00 AM END DATE/TIME: 11/10/2012 10:35:00 AM PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE: PLUNGE:-90 AZIMUTH: N/A



DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP



PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 42 DEPTH OF SOIL DRILL: 42 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473176.37 E: 4685723.58 GROUND SURFACE ELEV.: 1048.93

DATUM: N/A START DATE/TIME: 11/14/2012 END DATE/TIME: 11/16/2012

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: Sonic

AZIMUT	H: N/A PLUNGE:-90	T	END	DAT	E/TIME	: 11/16/2			
운 '	LITHOLOGY DESCRIPTION	nical	9 6	oe.	Ê		PLE INFORMATION Soil Sample Description	Well	Well
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical	Sample No.	Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Graphic	Construction Information
- - 1045.0 -	Concrete Soft, brown, fine Gravelly Silty CLAY. Firm, brown, clayey SILT with trace fine to medium Gravel.		1	S	0	5/5	0.0-0.5 ft.: Concrete 0.5-1.1 ft.: Soft, brown, fine Gravelly Sity CLAY. 1.1-5.0 ft.: Firm, brown, clayey SILT with trace fine to medium Gravel.		8-inch steel flush mount casing. 0.5-1.0 ft.: Cement 0.0-32.0 ft-bgs: Cement grout, 10-inch diameter borehole to 32 ft. Installed 6-inch diameter steel casing in a 10-inch
	Firm to stiff, brown, Silty CLAY with trace fine to medium gravel, mottled.		2	S	0	10 / 10	5.0-14.3 ft.: Firm to stiff, brown, Silty CLAY with trace fine to medium gravel, mottled. 14.3-15.0 ft.: Stiff to hard, gray, Silty CLAY with trace fine to medium Gravel, mottled, massive.		diameter borehole - grouted to surface and let set for >24 hours. Abvanced 4-inch diameter boring through the steel casing and set a 2-inch PVC well to 42 ft-bgs.
	Stiff to hard, gray, Silty CLAY with trace fine to medium Gravel, mottled, massive.		3	S	0	10 / 10	15.0-25.0 ft.: Stiff to hard, gray, Silty CLAY with trace fine to medium Gravel, mottled, massive.		
LITI	HOLOGY LEGEND Concrete USCS Clayey St	and (SC)		7	USCS (CL)	Low Plastic	ity Clay USCS Sit (ML)		
DRILL IN	G COMPANY: Boart-Longvear				10	GGED F	XY: MRH		

DRILLING COMPANY: Boart-Longyear DRILLER: B. Beunings

GOLDER INSPECTOR: CWA



PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 42 DEPTH OF SOIL DRILL: 42 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473176.37 E: 4685723.58 GROUND SURFACE ELEV:: 1048.93 DATI IM: N/A

DATUM: N/A START DATE/TIME: 11/14/2012 END DATE/TIME: 11/16/2012 DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: Sonic

		T		7		SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att.	Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
020.0 -	Stiff to hard, gray, Silty CLAY with trace fine to medium Gravel, mottled, massive. Loose, yellow, clayey fine to coarse SAND with trace fine to medium Gravel, moist, iron		4	Ø	0	5/5	25.0-29.0 ft.: Stiff to hard, gray, Silty CLAY with trace fine to medium Gravel, mottled, massive. 29.0-30.0 ft.: Loose, yellow, clayey fine to coarse SAND with trace fine to medium Gravel, moist. Grab sample collected at 29.5 ft.		O.O-32.0 ft-bgs: Cement grout, 10-inch diameter borehole to 32 ft. Installed 6-inch diameter steel casing in a 10-inch diameter borehole - grouted to surface and let set for >24 hours. Abvanced 4-inch diameter boring through the
	oxide staining at 32 ft. Compact, yellow-brown, Clayey fine to medium Gravelly fine to				0		30.0-34.2 ft.: Loose, yellow, clayey fine to coarse SAND with trace fine to medium Gravel, moist, iron oxide staining at 32 ft. 34.2-37.4 ft.: Compact, yellow-brown, Clayey fine to medium Gravelly fine to medium SAND, moist.		steel casing and set a 2-inch PVC well to 42 ft-bgs. 32.0-34.0 ft-bgs: Bentonite Seal 34.0-42.0 ft-bgs: Sand filter pack.
	medium SAND, moist. Compact, yellow-brown, Clayey fine to coarse Gravelly fine to medium SAND, dry, mottled.		5	S	2.2	12 / 12	37.4-39.3 ft.: Compact, yellow-brown, Clayey fine to coarse Gravelly fine to medium SAND, dry, mottled. 39.3-39.8 ft.: Soft, tan, fine to coarse gravelly SAND, some Clay, moist. 39.8-40.3 ft.: Soft, tan, fine Sandy SILT, some Clay, moist. 40.3-41.2 ft.: Loose, brown-tan, fine SAND, some Clay, moist. 41.2-42.0 ft.: Compact, brown, fine SAND with some Clay, trace fine Gravel, mottled, dry.		36.0-41.0 ft-bgs.: 2-inch PVC screen.
-	Soft, tan, fine sandy SILT, some Clay, moist. Soft, tan, fine Sandy SILT, some Clay, moist. Loose, brown-tan, fine SAND, some Clay, moist. Compact, brown, fine SAND with some Clay, trace fine Gravel, mottled, dry.						Grab sample collected at 41.5 ft.		
005.0 -									
- 000.0	HOLOGY LEGEND	7000							

DRILLING COMPANY: Boart-Longyear DRILLER: B. Beunings

GOLDER INSPECTOR: CWA



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473181.87 E: 4685723.4 GROUND SURFACE ELEV.: 1049.04 DATUM: N/A

START DATE/TIME: 11/9/2012 4:42:00 PM END DATE/TIME: 11/10/2012 8:50:00 AM

PAGE 1 of 2

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

DEPTH OF SOIL DRILL: 30 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNG PLUNGE:-90 SAMPLE INFORMATION Graphical Log Rec./Att. or e Rec. % Soil Sample Description Sample No. or Run No. Depth Elev. (mdd) LITHOLOGY DESCRIPTION Or Discontinuity Data Well Well Graphic Construction PID (Information (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Core Soil Steel flush mount with locking cap. 1-1.5 ft-bgs: Sand. 1.5-21.4 ft-bgs: Bentonite Seal 1045.0 No samples taken. 1040.0 1035.0 1030.0 21.4-29.5 ft-bgs: Clean, fine to coarse sand filter. 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 30



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473181.87 E: 4685723.4 GROUND SURFACE ELEV.: 1049.04

DATUM: N/A START DATE/TIME: 11/9/2012 4:42:00 PM END DATE/TIME: 11/10/2012 8:50:00 AM DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 30 DEPTH OF SOIL DRILL: 30
DEPTH OF ROCK CORE:
AZIMUTH: N/A PLUNGE:-90

SAMPLE INFORMATION Graphical Log Sample No. or Run No. Type /Att. % Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec./. Well Well Discontinuity Data Graphic Construction Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) PID Information Soil 21.4-29.5 ft-bgs: Clean, fine to coarse sand filter. 24.5-29.5 ft-bgs: 1.5-inch pre-packed PVC well screen. 1020.0 1015.0 1010.0 1005.0 1000.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

LOGGED BY: MRH LOGGED BY DATE: 11/30/2012 CHECKED BY: NSC

CHECKED BY DATE: 1/28/2013



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473184.15 E: 4685723.36 GROUND SURFACE ELEV.: 1049.13 DATUM: N/A

START DATE/TIME: 11/10/2012 7:48:00 AM END DATE/TIME: 11/10/2012 7:55:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Soil Sample Description Or Sample No. or Run No. /Att. Depth Elev. (mdd) Rec./ LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Steel flush mount with locking cap. 1-1.5 ft-bgs: Sand. 1.5-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand 1045.0 filter 3.0-13.0 ft-bgs: No samples taken. 1.5-inch pre-packed PVC well screen. 1040.0 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE:

HOLE DEPTH: 13

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473164.35 E: 4685836.07 GROUND SURFACE ELEV.: 1048.38

DATUM: N/A START DATE/TIME: 11/10/2012 8:58:00 AM END DATE/TIME: 11/10/2012 9:50:00 AM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log % Sample No. Or Run No. /Att Soil Sample Description Or Depth Elev. PID (ppm) LITHOLOGY DESCRIPTION Rec./, Well Well Discontinuity Data Graphic Construction Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Soil Steel flush mount with locking cap. 1-2.0 ft-bgs: Sand. 2.0-14.8 ft-bgs: Bentonite Seal 1045.0 No samples taken. 1040.0 1035.0 14.8-22.0 ft-bgs: Clean, fine to coarse sand filter. 17.0-22.0 ft-bgs: 1.5-inch pre-packed PVC well screen. 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

HOLE DEPTH: 22 DEPTH OF SOIL DRILL: 22 DEPTH OF ROCK CORE:

AZIMUTH: N/A



DRILLING METHOD: Roto Sonic CORING METHOD: N/A

DRILL RIG: Sonic

PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 29.5 DEPTH OF SOIL DRILL: 29.5 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90 BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473286.98 E: 4685718.68 GROUND SURFACE ELEV.: 1050.68 DATUM: N/A START DATE/TIME: 11/13/2012

END DATE/TIME: 11/13/2012

SAMPLE INFORMATION Sample No. Or Run No. Graphica Soil Sample Description /Att Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Log Rec. Discontinuity Data Graphic Construction (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Soil GRAVEL (Fill). 8-inch steel flush 1050.0 mount casing. Firm, brown, Sandy, Clayey SILT, 0.0-19.5 ft-bgs: Cement grout, 10-inch diameter 0.0-1.0 ft.: GRAVEL (Fill). S 5/5 1.0-5.0 ft.: Firm, brown, Sandy, Clayey borehole to 20 ft. SILT, moist. Installed 6-inch 0 diameter steel casing in a 10-inch diameter borehole grouted to surface Firm, brown, fine to coarse Sandy and let set for >24 hours. Abvanced 4-inch diameter CLAY with trace fine to coarse 1045.0 Gravel, moist. boring through the 30.9 steel casing and set a 2-inch PVC well to 5.0-10.0 ft.: Firm, brown, fine to coarse 29.5 ft-bgs. 2 S 5/5 Sandy CLAY with trace fine to coarse Gravel, moist. 53.8 1040.0 349.2 10.0-14.9 ft.: Firm, brown, fine to coarse Sandy CLAY with trace fine to coarse Gravel, moist. 3 S 5/5 14.9-15.0 ft.: Stiff to hard, Gray, Silty CLAY with trace fine to medium Gravel, moist. 2968 Stiff to hard, Gray, Silty CLAY with trace fine to medium 1035.0 Gravel, moist. 327 15.0-20.0 ft.: Stiff to hard, Gray, Silty 4 S 5/5 CLAY with trace fine to medium Gravel, moist. 232 19.5-21.5 ft-bgs: Bentonite Seal. 6-inch diameter 1030.0 borehole to 29.5 ft. 21.5-29.5 ft-bgs: Sand filter pack. 20.0-29.5 ft.: Stiff to hard, Gray, Silty 5 S 9.5 / 9.5 CLAY with trace fine to medium Gravel, moist. 23.5-28.5 ft-bgs.: 2-inch PVC screen

LITHOLOGY LEGEND

USCS Well-graded Gravel (GW)

USCS Low Plasticity Clay (CL)



USCS Low Plasticity Sandy Clay (CLS)

DRILLING COMPANY: Boart-Longyear

DRILLER: B. Beunings

GOLDER INSPECTOR: CWA

LOGGED BY: MRH LOGGED BY DATE: 1/25/2013 CHECKED BY: NSC CHECKED BY DATE: 1/25/2013



with sand pack.

PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 29.5 DEPTH OF SOIL DRILL: 29.5 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473286.98 E: 4685718.68 GROUND SURFACE ELEV.: 1050.68

DATUM: N/A START DATE/TIME: 11/13/2012 END DATE/TIME: 11/13/2012

DRILLING METHOD: Roto Sonic CORING METHOD: N/A
DRILL RIG: Sonic

						SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1025.0	Stiff to hard, Gray, Silty CLAY with trace fine to medium Gravel, moist.		5	S	1.9	9.5 / 9.5	20.0-29.5 ft.: Stiff to hard, Gray, Silty CLAY with trace fine to medium Gravel, moist.		23.5-28.5 ft-bgs.: 2-inch PVC screen with sand pack.
1020.0									
1015.0									
-									
1010.0									
_						8			
1005.0									
-									
LITH	HOLOGY LEGEND USCS Well-grade (GW)	ed Gravel			USCS (CL)	Low Plastic	ity Clay USCS Low Plasticity Sandy Clay (CLS)		

DRILLING COMPANY: Boart-Longyear DRILLER: B. Beunings

GOLDER INSPECTOR: CWA



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473280.8 E: 4685718.58 GROUND SURFACE ELEV.: 1050.68 DATUM: N/A

START DATE/TIME: 11/13/2012 END DATE/TIME: 11/13/2012

PAGE 1 of 2

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: Sonic

SAMPLE INFORMATION Graphica Sample No. Or Run No. Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec. Log Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil 0.0-0.5 ft.: GRAVEL 8-inch steel flush 1050.0 Soft, brown, sandy Clayey SILT, mount casing. moist, mottling at base 0 0.0-32.0 ft-bgs: 6.5-14.2 ft.: Firm, red-brown, Silty Cement grout. 0.0-0.5 ft.: GRAVEL fine Sandy CLAY with trace S 5/5 0.5-5.0 ft.: Soft, brown, sandy Clayey 1 fine to coasre Gravel, iron Advanced 12-inch oxide staining. SILT, moist, mottling at base. diameter temporary 14.2-15.0 ft.: Stiff, gray, fine to medium Sandy CLAY with trace fine to coarse Gravel, steel casing to 0.7 approximately 22 ft-bgs, then drilled a moist, massive. 10-inch diameter borehole through the 12-inch diameter casing to 1045.0 an approximate depth of 32 ft-bgs. Set a 6-inch 5.0-6.5 ft.: Soft, brown, Sandy Clayey SILT, moist, mottling at base. 6.5-14.2 ft.: Firm, red-brown, Silty fine 6.8 Stiff, gray, fine to medium Sandy CLAY with trace fine to coarse diameter steel Sandy CLAY with trace fine to coarse casing and grouted to surface, let the 2 S 10 / 10 Gravel, moist, massive. Gravel, iron oxide staining. 14.2-15.0 ft.: Stiff, gray, fine to medium grout cure for >24 Sandy CLAY with trace fine to coarse hours, then 672 Gravel, moist, massive. advanced a 4-inch diameter borehole through the 6-inch diameter steel casing to set the 1040.0 PVC well. 1035.0 3.1 15.0-25.0 ft.: Stiff, gray, fine to medium Sandy CLAY with trace fine to coarse 3 S 10 / 10 Gravel, moist, massive. 2.6 1030.0 LITHOLOGY LEGEND USCS Well-graded Gravel (GW) USCS Low Plasticity Clay USCS Low Plasticity Sandy Clay (CLS) (CL) USCS Poorly-graded Sand (SP) USCS Clayey Sand (SC)

DRILLING COMPANY: Boart Longyear DRILLER: B. Beunings

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 42

PLUNGE:-90

DEPTH OF SOIL DRILL: 42 DEPTH OF ROCK CORE:

AZIMUTH: N/A

GOLDER INSPECTOR: CWA



PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 42 DEPTH OF SOIL DRILL: 42 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473280.8 E: 4685718.58 GROUND SURFACE ELEV.: 1050.68

DATUM: N/A START DATE/TIME: 11/13/2012 END DATE/TIME: 11/13/2012 DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: Sonic

Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Avis, Type, and Surface Description)	Well Graphic	Well Construction Information
025.0	Stiff, gray, fine to medium Sandy CLAY with trace fine to coarse Gravel, moist, massive. Compact, yellow-brown Clayey, Silty, fine to medium SAND,		4	S	0	6.5 / 6.5	25.0-30.8 ft.: Stiff, gray, fine to medium Sandy CLAY with trace fine to coarse Gravel, moist, massive. 30.8-31.5 ft.: Compact, yellow-brown Clayey, Silty, fine to medium SAND, trace fine gravel, mottled, moist. Grab sample collected at 31.5 ft.		
015.0	Firm, brown, Clayey SILT. Firm, yellow-brown, fine to coarse Sandy CLAY with trace gravel, dry. Compact, brown, fine to medium SAND, moist.		5	Ø	2.7	10.5 / 10.5	31.5-38.9 ft.: Compact, yellow-brown Clayey, Silty, fine to medium SAND, trace fine gravel, mottled, moist. 38.9-39.3 ft.: Firm, brown, Clayey SILT. 39.3-39.8 ft.: Firm, yellow-brown, fine to coarse Sandy CLAY with trace gravel, dry. 39.8-42.0 ft.: Compact, brown, fine to medium SAND, moist. Grab sample collected at 41.5 ft.		32.0-34.0 ft-bgs: Bentonite Seal, 6 inch diameter borehole to 42 ft. 34-42.0 ft-bgs: Sand filter pack. 36.0-41.0 ft-bgs.: 2-inch PVC screen with sand pack.
005.0									

DRILLING COMPANY: Boart Longyear DRILLER: B. Beunings

GOLDER INSPECTOR: CWA



SAMPLE INFORMATION

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473365.95 E: 4685731.2 GROUND SURFACE ELEV.: 1050.78

DATUM: N/A START DATE/TIME: 11/12/2012 DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: Sonic

PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 43 DEPTH OF SOIL DRILL: 43 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

FROCK CORE: START DATE/TIME: 11/12/20 N/A PLUNGE:-90 END DATE/TIME: 11/14/2012

Graphical Log Soil Sample Description Sample No. Or Run No. Att. Depth Elev. (mdd) Rec.// LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Concrete at ground surface 8-inch steel flush Fine to coarse SAND. 1050.0 mount casing. Brown SILTY CLAY with Gravel. 0.0-0.4 ft: Concrete. 0.0-33.0 ft-bgs: Blocky structure. 0.4-1.0 ft.: Loose, fine to coarse SAND.
1.0-2.5 ft.: Firm, brown Silty CLAY with trace Gravel. Blocky structure.
2.5-5.0 ft.: Firm, brown Silty CLAY with Cement grout. S 5/5 1 0.5 Advanced 12-inch diameter temporary trace fine Gravel, mottled, platy steel casing to structure, moist. approximately 22 ft-bgs, then drilled a 10-inch diameter borehole through Brown SILTY CLAY with Gravel, the 12-inch mottled, massive, moist. diameter casing to 1045 0 an approximate depth of 33 ft-bgs. Set a 6-inch 25 5.0-10.0 ft.: Firm, brown Silty CLAY with trace fine to medium Gravel, diameter steel mottled, massive, moist. casing and grouted S 10 / 10 2 10.0-15.0 ft.: Firm, brown Silty CLAY, with trace fine to medium Gravel, to surface, let the grout cure for >24 mottled, massive, strong odor, moist. hours, then 234 advanced a 4-inch diameter borehole through the 6-inch diameter steel casing to set the PVC well. 1040.0 Gray SILTY CLAY with Gravel, mottled, massive, moist. 1035.0 78 15.0-20.0 ft.: Stiff, gray, Silty CLAY with trace fine to medium Gravel, mottled, massive, moist. 20.0-25.0 ft.: Stiff, gray, Silty CLAY, with trace fine to medium Gravel, 3 S 10 / 10 1030.0 mottled, massive, moist. 28 LITHOLOGY LEGEND USCS Low Plasticity Clay Concrete Fill (made ground) (CL) USCS Poorly-graded Gravel (GP) USCS Clayey Sand (SC-SM) USCS Silty Sand (SM)

DRILLING COMPANY: Boart-Longyear DRILLER: B. Beunings

GOLDER INSPECTOR: CWA



PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 43 DEPTH OF SOIL DRILL: 43 DEPTH OF ROCK CORE: PLUNGE:-90 AZIMUTH: N/A

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473365.95 E: 4685731.2 GROUND SURFACE ELEV.: 1050.78 DATUM: N/A START DATE/TIME: 11/12/2012 END DATE/TIME: 11/14/2012

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: Sonic

	I. IVA	I		D/ (1	L I IIVIL		PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att.	Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Avis, Type, and Surface Description)	Well Graphic	Well Construction Information
1025.0	Gray SILTY CLAY with Gravel, mottled, massive, moist. Yellow-brown, Silty CLAY with fine to medium Sand, trace fine to coarse Gravel, mottled,		4	S	29	8/8	25.0-31.0 ft.: Stiff, gray, Silty CLAY with trace fine to medium gravel, massive, moist. 31.0-33.0 ft.: Compact, yellow-brown, Silty CLAY with trace fine to medium Sand, trace fine to coarse Gravel, mottled, strong odor, moist.		
015.0	Gray Sitty fine to medium SAND, wet. Brown, Sitty fine to medium SAND with trace fine Gravel, wet.				489		33.0-34.2 ft.: Loose, yellow-brown, Silty CLAY with trace fine to medium Sand, trace fine to coarse Gravel, mottled, strong odor, moist. 34.2-34.7 ft.: Loose, gray Silty fine to medium SAND, wet. 34.7-37.6 ft.: Loose, brown, Silty fine to		33.0-35.0 ft-bgs: Bentonite Seal. 6-inch diameter borehole to 43 ft. 35-43.0 ft-bgs: Sand filter pack. 37.0-42.0 ft-bgs.: 2-inch PVC screen
010.0	Yellow-brown, Clayey fine to coarse SAND with trace fine Gravel, wet. Yellow-brown, Sitty fine to coarse SAND, wet. Yellow-brown, fine to coarse		5	S	33.8	10 / 10	medium SAND with trace fine Gravel, wet. 37.6-39.1 ft.: Loose, yellow-brown, Clayey fine to coarse SAND with trace fine Gravel, wet. 39.1-41.8 ft.: Loose, yellow-brown, fine to coarse Sandy Coarse GRAVEL, wet. 41.8-43.0 ft.: Very Loose, yellow-brown, fine to coarse Sandy coarse GRAVEL, wet.		2-inch PVC screen with sand pack.
005.0	Sandy coarse GRAVEL, wet.	5000			2				
LITH	HOLOGY LEGEND Concrete USCS Silty Sand	(SM)				nade ground 6 Clayey San			

DRILLING COMPANY: Boart-Longyear DRILLER: B. Beunings

GOLDER INSPECTOR: CWA



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473378.14 E: 4685731.5 GROUND SURFACE ELEV.: 1050.83

DATUM: N/A START DATE/TIME: 11/10/2012 3:45:00 PM END DATE/TIME: 11/10/2012 4:35:00 PM PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log % Sample No. or Run No. /Att Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION I Rec./ Well Well Discontinuity Data Graphic Construction PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Core Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-11.0 ft-bgs: Bentonite Seal No samples taken. 1045.0 1040.0 11.0-18.0 ft-bgs: Clean, fine to coarse sand filter. 13.0-18.0 ft-bgs: 1.5-inch pre-packed PVC well screen. 1035.0 1030.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 18

PLUNGE:-90

DEPTH OF SOIL DRILL: 18 DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473387.28 E: 4685793.87 GROUND SURFACE ELEV.: 1050.26

DATUM: N/A START DATE/TIME: 11/12/2012 10:08:00 AM END DATE/TIME: 11/12/2012 11:20:00 AM PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

HOLE DEPTH: 20
DEPTH OF SOIL DRILL: 20
DEPTH OF ROCK CORE:
AZIMUTH: N/A PLUNGE:-90 SAMPLE INFORMATION Graphical Log Sample No. or Run No. /Att Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION I Rec./. Well Well Discontinuity Data Construction Graphic (Depth, Dip, Angle From Core Axis, Type, and Surface Description) PID Information Soil 1050.0 Steel flush mount with locking cap. 1-1.5 ft-bgs: Sand. 1.5-13.0 ft-bgs: Bentonite Seal No samples taken. 1045.0 1040.0 13.0-20.0 ft-bgs: Clean, fine to coarse sand filter. 15.0-20.0 ft-bgs: 1035.0 1.5-inch pre-packed PVC well screen.

LITHOLOGY LEGEND

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 20

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

1030.0

GOLDER INSPECTOR: JSP



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473181.47 E: 4685490.06 GROUND SURFACE ELEV.: 1049.51 DATUM: N/A

START DATE/TIME: 11/12/2012 11:15:00 AM END DATE/TIME: 11/12/2012 12:10:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Soil Sample Description Sample No. or Run No. /Att. Depth Elev. (mdd) Rec.// or S Rec. LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction PID (Information Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Steel flush mount with locking cap. 0.4-1.5 ft-bgs: Sand. 1.5-10.0 ft-bgs: Bentonite Seal 1045.0 No samples taken. 1040.0 10.0-17.0 ft-bgs: Clean, fine to coarse sand filter. 12.0-17.0 ft-bgs: 1.5-inch pre-packed PVC well screen. 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 17 DEPTH OF SOIL DRILL: 17 DEPTH OF ROCK CORE:

PLUNGE:-90

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473292.49 E: 4685890.28 GROUND SURFACE ELEV.: 1048.97 DATUM: N/A START DATE/TIME: 11/13/2012 1:25:00 PM

END DATE/TIME: 11/13/2012 2:00:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Rec./Att. or e Rec. % Sample No. or Run No. Type Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction PID (Information (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Core Soil Steel flush mount with locking cap. 0.3-0.5 ft-bgs: Sand. 0.5-1.0 ft-bgs: Bentonite Seal 1.0-12.0 ft-bgs: Clean, fine to coarse sand 1045.0 filter. 2.0-12.0 ft-bgs: No samples taken. 1.5-inch pre-packed PVC well screen. 1040.0 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

HOLE DEPTH: 12
DEPTH OF SOIL DRILL: 12
DEPTH OF ROCK CORE:

AZIMUTH: N/A



PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473267.08 E: 4685937.93 GROUND SURFACE ELEV.: 1047.89 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE: DATUM: N/A PLUNGE:-90

AZIMUTH: N/A

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

START DATE/TIME: 11/12/2012 1:20:00 PM END DATE/TIME: 11/12/2012 3:50:00 PM

SAMPLE INFORMATION

Graphical Log Soil Sample Description Or Sample No. or Run No. /Att. Depth Elev. (mdd) Or Rec./ LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction Information PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Raised steel protective casing. 0.4-1.0 ft-bgs: Sand. 1.0-2.0 ft-bgs: Bentonite Seal 1045.0 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 3.0-13.0 ft-bgs: No samples taken. 1.5-inch pre-packed PVC well screen. 1040.0 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473266.72 E: 4685892.37 GROUND SURFACE ELEV.: 1048.77 DATUM: N/A

START DATE/TIME: 11/12/2012 4:00:00 PM END DATE/TIME: 11/12/2012 5:15:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. or Run No. Soil Sample Description /Att Depth Elev. (mdd) Rec./. LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction PID (Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Steel flush mount with locking cap. 0.5-1.0 ft-bgs: Sand. 1.0-1.5 ft-bgs: Bentonite Seal 1.5-12.0 ft-bgs: Clean, 1045.0 fine to coarse sand filter. 2.0-12.0 ft-bgs: 1.5-inch pre-packed PVC well screen. No samples taken. 1040.0 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 12 DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE:

AZIMUTH: N/A

PLUNGE:-90



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473214.02 E: 4685894.38 GROUND SURFACE ELEV.: 1049.37 DATUM: N/A

START DATE/TIME: 11/13/2012 2:40:00 PM END DATE/TIME: 11/13/2012 3:30:00 PM

PAGE 1 of 1

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Soil Sample Description Sample No. Or Run No. Type /Att. Depth Elev. (mdd) Rec./, Or Discontinuity Data LITHOLOGY DESCRIPTION Well Well Graphic Construction PID (Information (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Core Soil Steel flush mount with locking cap. 0.2-0.5 ft-bgs: Sand. 0.5-1.0 ft-bgs: Bentonite Seal 1.0-12.0 ft-bgs: Clean, fine to coarse sand filter. 1045.0 2.0-12.0 ft-bgs: No samples taken. 1.5-inch pre-packed PVC well screen. 1040.0 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 12

PLUNGE:-90

DEPTH OF SOIL DRILL: 12 DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOG: MW-54 (MIP-68)

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473488.99 E: 4685626.45 GROUND SURFACE ELEV.: 1050.81 DATUM: N/A START DATE/TIME: 11/16/2012 10:50:00 AM

END DATE/TIME: 11/16/2012

PAGE 1 of 2

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. Rec./Att. or e Rec. % Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Core Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-22.0 ft-bgs: Bentonite Seal No samples taken. 1045.0 1040.0 1035.0 1030.0 22.0-29.0 ft-bgs: Clean, fine to coarse sand filter. 24.0-29.0 ft-bgs: 1.5-inch pre-packed PVC well screen. LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

HOLE DEPTH: 29 DEPTH OF SOIL DRILL: 29 DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOG: MW-54 (MIP-68)

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473488.99 E: 4685626.45 GROUND SURFACE ELEV.: 1050.81 DATUM: N/A

START DATE/TIME: 11/16/2012 10:50:00 AM END DATE/TIME: 11/16/2012

PAGE 2 of 2

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log Sample No. or Run No. /Att. % Soil Sample Description Depth Elev. (mdd) Rec./, LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction DID ((Depth, Dip, Angle From Core Axis, Type, and Surface Description) Information Core Soil 24.0-29.0 ft-bgs: 1.5-inch pre-packed 1025.0 PVC well screen. 1020.0 1015.0 1010.0 1005.0 LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305
HOLE DEPTH: 29
DEPTH OF SOIL DRILL: 29
DEPTH OF ROCK CORE:

AZIMUTH: N/A

PLUNGE:-90



BOREHOLE LOG: MW-55D (MIP-70) BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473518.94 E: 4685622.68 DRILLI

GROUND SURFACE ELEV.: 1050.59

DATUM: N/A START DATE/TIME: 11/13/2012 8:27:00 AM END DATE/TIME: 11/13/2012 9:45:00 AM PAGE 1 of 2

DRILLING METHOD: Direct Push CORING METHOD: DRILL RIG: 6600

SAMPLE INFORMATION Graphical Log % Sample No. or Run No. /Att. Soil Sample Description Type Depth Elev. (mdd) LITHOLOGY DESCRIPTION Or Or Rec. Well Well Discontinuity Data Graphic Construction PID ((Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Soil Steel flush mount with 1050.0 locking cap. 1-1.5 ft-bgs: Sand. 1.5-22.0 ft-bgs: Bentonite Seal No samples taken. 1045.0 1040.0 1035.0 1030.0 22.0-29.0 ft-bgs: Clean, fine to coarse sand filter. 24.0-29.0 ft-bgs: 1.5-inch pre-packed PVC well screen. LITHOLOGY LEGEND

DRILLING COMPANY: Matrix Environmental

DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 29 DEPTH OF SOIL DRILL: 29 DEPTH OF ROCK CORE:

PLUNGE:-90

AZIMUTH: N/A



BOREHOLE LOG: MW-55D (MIP-70)

BOREHOLE LOCATION: Jefferson, IA
COORDINATES: N: 3473518.94 E: 4685622.68
GROUND SURFACE ELEV.: 1050.59

DRILLII
CORIN

DATUM: N/A START DATE/TIME: 11/13/2012 8:27:00 AM END DATE/TIME: 11/13/2012 9:45:00 AM

PAGE 2 of 2

DRILLING METHOD: Direct Push CORING METHOD: DRILL RIG: 6600

						SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Ass, Type, and Surface Description)	Well Graphic	Well Construction Information
1025.0									24.0-29.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
_									PVC well screen.
-									
-									
1020.0									
_									
-								s	
-									
1015.0									
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-									
-							·	ð.	
1010.0									
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-									
1005.0									
_									
-									
-									
LITH	HOLOGY LEGEND								

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 29

DEPTH OF SOIL DRILL: 29 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90



BOREHOLE LOG: MW-55S (MIP-70)

BOREHOLE LOCATION: Jefferson, IA
COORDINATES: N: 3473519.08 E: 4685625.36
GROUND SURFACE ELEV.: 1050.87
DATI IM: N/A

DRILLING METHOD: Direct Push CORING METHOD: N/A DRILL RIG: 6600

PAGE 1 of 1

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 13 DEPTH OF SOIL DRILL: 13 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

DATUM: N/A START DATE/TIME: 11/13/2012 8:05:00 AM END DATE/TIME: 11/13/2012 9:40:00 AM

AZIMUTH: N/A PLUNGE:-90	_					U12 9:40:00 AM		
					SAM	PLE INFORMATION	4	
LITHOLOGY DESCRIPTION	Graphical	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1045.0	9	Samp		Old	Soil R. Core F. Core F.	(Depth, Dip. Angle From Core Axis, Type, and Surface Description) No samples taken.		Steel flush mount with locking cap. 0.5-1.0 ft-bgs: Sand. 1.0-2.0 ft-bgs: Bentonite Seal 2.0-13.0 ft-bgs: Clean, fine to coarse sand filter. 3.0-13.0 ft-bgs: 1.5-inch pre-packed PVC well screen.
1030.0 _								

DRILLING COMPANY: Matrix Environmental DRILLER: G. Paquette

GOLDER INSPECTOR: JSP



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473198.6 E: 4685938.54 GROUND SURFACE ELEV.: 1047.76

START DATE/TIME: 2/27/2013 12:20:00 PM END DATE/TIME: 2/27/2013 1:40:00 PM PAGE 1 of 2

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

SAMPLE INFORMATION Graphica % Soil Sample Description Sample No. Or Run No. Depth Elev. (mdd) Rec./, LITHOLOGY DESCRIPTION Log Well Well Discontinuity Data Graphic Construction B (Depth, Dip. Angle From Core Axis, Type. and Surface Description) Information Core Soil Stiff, red-brown to brown, SILT and CLAY, some sand, none to 6-inch steel surface casing to 2.6 ft some gravel, dry to moist. above ground. Bollards placed 0.4 0.0-2.0 ft-bgs: Soft, dark gray, SILT, around well for some sand, moist (CL). protection. 2.0-5.0 ft-bgs: Stiff, brown to gray, SILT and CLAY, some sand, trace gravel, S 5/5 0.0-29.0 ft-bgs: 1045.0 Cement grout. moist (CL). 0.2 Installed 6-inch diameter steel casing in a 10-inch diameter borehole to 29.0 ft-bgs grouted to surface and let set for >24 hours. Advanced 0.2 4-inch diameter boring through the steel casing and set a 2-inch PVC well to 5.0-10.0 ft-bgs: Stiff, red to brown, SILT 2 S 5/5 and CLAY, some sand, trace gravel, 1040.0 dry (CL). 38 ft-bgs. 0.2 0.2 10.0-13.0 ft-bgs: Stiff, brown, SILT and CLAY, some sand, trace gravel, 3 S 5/5 1035.0 13.0-15.0 ft-bgs: Dense, gray, SILT, some sand, wet (ML). Loose to dense, gray, SILT, some sand, trace to some 0.1 gravel, moist to wet. 15.0-20.0 ft-bgs: Dense, gray, SILT S 5/5 some sand, some gravel, moist (ML). 1030.0 0.1 Stiff, gray, SILT and CLAY, some sand, none to trace gravel. 0.0 20.0-25.0 ft-bgs: Stiff, gray, SILT and 5 S 5/5 CLAY, some gravel, some sand, dry 1025.0 (CL). 0.1 LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Silt (ML) USCS Silty Sand (SM)

DRILLING COMPANY: Boart Longyear

DRILLER: J. Drabek

GOLDER INSPECTOR: DWM

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 39 DEPTH OF ROCK CORE:

HOLE DEPTH: 39

AZIMUTH: N/A



PAGE 2 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 39 DEPTH OF SOIL DRILL: 39 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473198.6 E: 4685938.54 GROUND SURFACE ELEV.: 1047.76 DATUM: N/A START DATE/TIME: 2/27/2013 12:20:00 PM END DATE/TIME: 2/27/2013 1:40:00 PM

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

						SAMI	PLE INFORMATION		
Elev.	LITHOLOGY DESCRIPTION	Graphical	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
020.0	Stiff, gray, SILT and CLAY, some sand, none to trace gravel.		6	S	0.0	4/4	25.0-29.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, trace gravel, moist (CL).		
015.0	Dense, SILT, SAND and GRAVEL, wet.		7	S	0.9	6/6	29.0-31.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, trace gravel, moist (CL). 31.0-33.0 ft-bgs: Stiff, yellow-brown, SILT and CLAY, some sand, trace gravel, moist (CL). 33.0-34.0 ft-bgs: Loose, brown, SILT, wet (ML). 34.0-35.0 ft-bgs: Very dense, brown, SILT and GRAVEL, moist (ML).		29.0-31.0 ft-bgs: Granular bentonite 31.0-39.0 ft-bgs: #2 sand filter pack 33.0-38.0 ft-bgs: 2-inch PVC well screen (0.010-inch slotted).
 _ _ 010.0 _	Stiff, gray, SILT and CLAY, some sand, none to trace gravel.		8	S	0.5	4/4	35.0-37.0 ft-bgs: Loose, yellow-brown, silty SAND, some gravel, wet (SM). 37.0-39.0 ft-bgs: Stiff, yellow-brown, SILT and CLAY, trace clay, moist, friable (CL).		
-									
005.0 _				9					
- 000.0 _ -					4				

GOLDER INSPECTOR: DWM

CHECKED BY: CHECKED BY DATE:



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473203.94 E: 4685937.19 GROUND SURFACE ELEV.: 1047.82 DATUM: N/A

START DATE/TIME: 2/27/2013 1:40:00 PM END DATE/TIME: 2/27/2013 2:30:00 PM

PAGE 1 of 1

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

SAMPLE INFORMATION Graphical Log Sample No. or Run No. /Att Soil Sample Description Depth Elev. (mdd) Rec.// Or Rec. LITHOLOGY DESCRIPTION Well Well Discontinuity Data Graphic Construction Information PID Core (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Soil Steel casing to 2.6 ft above ground. Bollards placed around well for protection. 4-inch diameter boring 0.0-1.0 ft-bgs: Cement 1045.0 1.0-4.0 ft-bgs: Granular bentonite 4.0-15.0 ft-bgs: #2 Sand filter 5.0-15.0 ft-bgs: 2-inch PVC well screen (0.010-inch slotted) No samples collected. Refer to MW-56D for soil stratigraphy. 1040.0 1035.0 1030.0 1025.0 LITHOLOGY LEGEND

DRILLING COMPANY: Boart Longyear

DRILLER: J. Drabek

GOLDER INSPECTOR: DWM

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 15

PLUNGE:-90

DEPTH OF SOIL DRILL: 20 DEPTH OF ROCK CORE:

AZIMUTH: N/A



PROJECT: Electrolux Jefferson						E LOG: MW-57 Jefferson, IA	PA	GE 1 of 2
PROJECT NO.: 103-87305 HOLE DEPTH: 38 DEPTH OF SOIL DRILL: 38 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90		GRO DATU STAF	RDIN UND JM: N RT D	IATES: SURFA N/A ATE/TIN	N: 3473 ACE ELE ME: 2/27/ : 3/1/201	169.91 E: 4685827.39 DRILLING V.: 1048.59 CORING (2013 10:00:00 AM 3 9:45:00 AM	METHOD: Sonic METHOD: N/A G: CDD 1415	
					SAM	PLE INFORMATION		
LITHOLOGY DESCRIPTION	Graphical	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
Stiff, gray with red-brown streaks, SILT and CLAY, some sand, trace gravel, dry to moist		1	S	5.2	5/5	0.0-5.0 ft-bgs: Stiff, brown with red-gray streaks, SILT and CLAY, some sand trace gravel, dry, friable (CL).		10-inch road box at surface Installed 6-inch diameter steel casing in a 10-inch diameter borehole to 29.0 ft-bgs - grouted to surface and let set for >24 hours. Advanced 4-inch diameter boring through the
1040.0		2	S	7.5	5/5	5,0-10.0 ft-bgs: Stiff, brown to gray, SILT and CLAY, some sand, trace gravel, wet, friable (CL).		steel casing and set a 2-inch PVC well to 37 ft-bgs. 0.0-29.0 ft-bgs: Cement grout
1035.0		3	S	3.9	5/5	10.0-15.0 ft-bgs: Stiff, gray with red-brown streaks, SILT and CLAY, some sand, trace gravel, dry, friable (CL).		
Stiff, gray, SILT and CLAY, some sand, trace gravel, moist		4	S	0.4	5/5	15.0-20.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, trace gravel, fry, friable (CL).		
1025.0		5	S	2.4	- 5/5	20.0-25.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, trace gravel, moist, friable (CL).		
LITHOLOGY LEGEND USCS Low Plast	ticity Clay			USCS	Low Plastic CL-ML)	ity Silty		

DRILLING COMPANY: Boart Longyear DRILLER: J. Drabek

GOLDER INSPECTOR: DWM



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473169.91 E: 4685827.39 GROUND SURFACE ELEV.: 1048.59 DATUM: N/A

START DATE/TIME: 2/27/2013 10:00:00 AM END DATE/TIME: 3/1/2013 9:45:00 AM

PAGE 2 of 2

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

SAMPLE INFORMATION Graphical Log Sample No. or Run No. % Soil Sample Description /Att Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec.// Rec. Well Well Discontinuity Data Graphic Construction (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information BD Core Soil 0.0-29.0 ft-bgs: Stiff, gray, SILT and CLAY, some Cement grout sand, trace gravel, moist 25.0-29.0 ft-bgs: Stiff, gray, SILT and 5 S 4/4 CLAY, some sand, trace gravel, 0.2 moist, friable (CL). 1020.0 Stiff, yellow-brown SILT and CLAY, some gravel, some 29.0-30.5 ft-bgs: Granular bentonite sand, moist 29.0-31.0 ft-bgs: Stiff, yellow-brown SILT and CLAY, some gravel, some sand, moist, friable (CL). 30.5-38.0 ft-bgs: #2 1.6 sand pack. 31.0-32.5 ft-bgs: Loose, yellow-brown SILT, wet (ML).
32.5-34.5 ft-bgs: Stiff, yellow-brown SILT and CLAY, some sand, trace S 6/6 6 32.0-37.0 ft-bgs: 2-inch PVC well screen (0.010-inch gravel, dry (CL) 34.5-35.0 ft-bgs: Very dense, slotted). brown-gray SILT, some sand, trace gravel (ML). 6.8 1015.0 Very stiff, brown-yellow SILT and CLAY, some sand, some 35.0-38.0 ft-bgs: Very stiff, brown-yellow SILT and CLAY, some 7 S 3/3 1.9 sand, some gravel, moist (CL). 1010.0 1005.0 1000.0 LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Low Plasticity Silty Clay (CL-ML)

DRILLING COMPANY: Boart Longyear

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 38 DEPTH OF ROCK CORE:

HOLE DEPTH: 38

AZIMUTH: N/A

DRILLER: J. Drabek

GOLDER INSPECTOR: DWM CHECKED BY:

LOGGED BY: MRH
LOGGED BY DATE: 3/12/2013
CHECKED BY: CHECKED BY: CHECKED BY DATE:

Golder
CHECKED BY DATE:

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473158.37 E: 4685672.68 GROUND SURFACE ELEV.: 1049.04 DATUM: N/A

START DATE/TIME: 2/26/2013 3:45:00 PM END DATE/TIME: 2/28/2013 11:00:00 AM

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 40

PLUNGE:-90

DEPTH OF SOIL DRILL: 40 DEPTH OF ROCK CORE:

AZIMUTH: N/A

PAGE 1 of 2

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. /Att Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec./ Well Well Discontinuity Data Graphic Construction PID (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Information Core Soil Dense, brown, SILT and 10-inch road box at GRAVEL, some sand surface. Installed 6-inch diameter steel 0.0-1.0 ft-: Dense, brown, SILT and GRAVEL, some sand, low recovery casing in a 10-inch S 1/5 1 diameter borehole to 29.0 ft-bgs -grouted to surface 04 due to plugged drill casing. and let set for >24 hours. Advanced 4-inch diameter 1045.0 boring through the steel casing and set a 2-inch PVC well to 39 ft-bgs. 0.9 0.0-29.0 ft-bgs: Cement grout, 5.0-10.0 ft-bgs: Dense, brown, SILT, 4-inch diameter 2 S 5/5 some sand moist (ML). boring. 02 1040.0 Stiff, red-brown to brown, CLAY, some gravel, some sand, moist 0.2 10.0-15.0 ft-bgs: Stiff, red-brown, 3 S 5/5 CLAY, some gravel, some sand, moist (CL). 0.1 1035.0 0.3 15.0-20.0 ft-bgs: Stiff, brown, SILT and 4 S CLAY, some sand, moist, friable 5/5 0.3 1030.0 Stiff, gray, SILT and CLAY, some sand, trace gravel, dry 0.2 20.0-25.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, trace gravel, dry, 5 S 5/5 friable (CL). 0.1 1025.0 LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Silt (ML) DRILLING COMPANY: Boart Longyear LOGGED BY: MRH DRILLER: J. Drabek LOGGED BY DATE: 3/12/2013 Golder ssociates CHECKED BY: CHECKED BY DATE: GOLDER INSPECTOR: DWM

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 40 DEPTH OF SOIL DRILL: 40
DEPTH OF ROCK CORE:
AZIMUTH: N/A PLUNGE:-90 BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473158.37 E: 4685672.68 GROUND SURFACE ELEV.: 1049.04

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

PAGE 2 of 2

DATUM: N/A START DATE/TIME: 2/26/2013 3:45:00 PM END DATE/TIME: 2/28/2013 11:00:00 AM

						SAM	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type. and Surface Description)	Well Graphic	Well Construction Information
1020.0 -	Stiff, gray, SILT and CLAY, some sand, trace gravel, dry		6	S	0.5	5/5	25.0-30.0 ft-bgs: Stiff, gray, CLAY and SILT, some gravel, some sand, dry, friable (CL).		0.0-29.0 ft-bgs: Cement grout, 4-inch diameter boring. 29.0-32.0 ft-bgs: Granular bentonite.
1015.0 -	Stiff, dark yellow, SILT and CLAY, some gravel, some sand, dry		7	S	4.1	5/5	30.0-35.0 ft-bgs: Stiff, dark yellow, SILT and CLAY, some gravel, some sand, dry, friable (CL).		32.0-40.0 ft-bgs: #2 sand filter. 34.0-39.0 ft-bgs: 2-inch PVC well screen (0.010-inch
1010.0 -			8	S	0.2	5/5	35.0-40.0 ft-bgs: Stff, dark yellow, SILT and CLAY, some gravel, some sand, dry, friable (CL).		slotted).
1005.0 -									
LITH	HOLOGY LEGEND USCS Silt (ML)				USCS (CL)	Low Plastic	ity Clay		

DRILLING COMPANY: Boart Longyear DRILLER: J. Drabek

GOLDER INSPECTOR: DWM



PROJECT HOLE DI DEPTH	CT: Electrolux Jefferson ET NO: 103-87305 EPTH: 41 DF SOIL DRILL: 41 DF ROCK CORE: H: N/A PLUNGE:-90		BORE COOL GROU DATU STAR	EHOI RDIN UND UND JM: N	LE LOC IATES: SURFA N/A ATE/TIN	ATION: N: 3473 ACE ELE ME: 2/27/ : 3/1/201	V.: 1050.19 CORING M DRILL RIG: 3 9:45:00 AM	METHOD: Sonic ETHOD: N/A	GE 1 of 2
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. or Run No.	Type	PID (ppm)	Soil Rec./Att.	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1050.0 - - -	Stiff, red-brown, SILT and CLAY, some sand, trace gravel, dry		1	S	7.2 8.5	5/5	0.0-2.0 ft-bgs: Stiff, brown, SILT and CLAY, some sand dry, friable (CL). 2.0-5.0 ft-bgs: Stiff, brown, CLAY, some sand, pliable (CL).		10-inch road box at surface. Installed 6-inch diameter steel casing in a 10-inch diameter borehole to 31.0 ft-bgs - grouted to surface and let set for >24 hours. Advanced 4-inch diameter
1045.0 - - -			2	S	0.2	5/5	5.0-10.0 ft-bgs: Stiff, red-brown, SILT and CLAY, some sand, trace gravel, dry (CL).		boring through the steel casing and set a 2-inch PVC well to 40 ft-bgs. 0.0-31.0 ft-bgs: Cement grout
1040.0			3	S	0.2	5/5	10.0-15.0 ft-bgs: Stiff, red-brown, SILT and CLAY, some sand, trace gravel, dry (CL).		
1035.0	,		4	S	0.2	5/5	15.0-20.0 ft-bgs: Stiff, brown to gray, SILT and CLAY, some sand, trace gravel, dry (CL).		,
1030.0	Stiff, gray, SILT and CLAY, some sand, some gravel, dry (CL).		5	S	0.1	- 5/5	20.0-25.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, some gravel, dry (CL).		
DRILLIN DRILLER	G COMPANY: Boart Longyear R: J. Drabek R INSPECTOR: DWM	icity Clay			LC LC	HECKED	BY DATE: 3/12/2013		Golder Associates

PAGE 2 of 2

HOLE DEPTH (ot No.: 103-87305 EPTH: 41 OF SOIL DRILL: 41 OF ROCK CORE: H. N/A PLUNGE:-90		GRO DATU STAF	UND JM: N RT D/	SURFA NA ATE/TIM	ACE ELE ME: 2/27/ : 3/1/201	V.: 1050.19 CORING N	METHOD: Sonic METHOD: N/A i: CDD 1415	
Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att.	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
025.0	Stiff, gray, SILT and CLAY, some sand, some gravel, dry (CL).		5	S	0.1	4/4	25.0-29.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, some gravel, dry (CL).		0.0-31.0 ft-bgs: Cement grout
020.0			6	S	1.7	5/5	29.0-31.0 ft-bgs: Stiff, gray, SILT and CLAY, some gravel, some sand, moist (CL). 31.0-33.0 ft-bgs: Stiff, red-brown, SILT and CLAY, some sand, trace gravel		31.0-33.0 ft-bgs: Granular bentonite
- 015.0 -	Dense, yellow-brown, SILT, some gravel, some sand				0.3		(CL). 33.0-36.0 ft-bgs: Dense, yellow-brown, SILT, some gravel, some sand (ML).		33.0-41.0 ft-bgs: #2 sand filter pack 35.0-40.0 ft-bgs: 2-inch PVC well screen (0.010-inch slotted).
-			7	S	1.9	3/3	36.0-39.0 ft-bgs: Loose, yellow-brown, SILT, some sand, wet (ML).		sided).
010.0	Stiff, yellow-brown, SILT and CLAY, some gravel, some sand, dry		8	S	0.2	2/2	39.0-41.0 ft-bgs: Stiff, yellow-brown, SILT and CLAY, some gravel, some sand, dry (CL).		
-			Ķ.						
005.0									
-									
LITH	HOLOGY LEGEND USCS Low Plasti (CL)	city Clay			uscs	Silt (ML)			

DRILLING COMPANY: Boart Longyear DRILLER: J. Drabek

GOLDER INSPECTOR: DWM



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473101.18 E: 4685520 GROUND SURFACE ELEV.: 1052.84 DATUM: N/A

START DATE/TIME: 2/27/2013 2:40:00 PM END DATE/TIME: 2/27/2013 3:05:00 PM

PAGE 1 of 1

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. Att Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Rec./ Well Well Discontinuity Data Graphic Construction PID Information (Depth, Dip. Angle From Core Axis, Type, and Surface Description) Core Soil Stiff, dark gray, SILT and CLAY, some sand, moist 2.6 ft above ground casing stickup at surface. Bollards 0.2 placed around well 0.0-4.0 ft-bgs: Stiff, dark gray, SILT and for protection. CLAY, some sand, moist, friable, moist (CL). 4-inch diameter hole S 5/5 0.0-2.0 ft-bgs: Cement 1050.0 4.0-5.0 ft-bgs: Dense, brown to light tan, SILT, some sand, dry (ML). 4-inch steel casing to 0.2 2.6 ft above ground Dense, brown to light tan, SILT, surface 0.0-13.0 ft-bgs: some sand, dry Granular bentonite Stiff, brown with gray streaks, SILT and CLAY, some sand, trace gravel 0.2 5.0-10.0 ft-bgs: Stiff, brown with gray streaks, SILT and CLAY, some sand, 2 S 5/5 1045.0 trace gravel, friable, wet (CL). 0.2 0.2 10.0-15.0 ft-bgs: Stiff, brown with red streaks, SILT and CLAY, some sand, 3 S 5/5 1040.0 moist, no odor (CL), pliable. 13.0-20.0 ft-bgs: #2 Sand filter 0.1 15.0-20.0 ft-bgs: 2-inch PVC well 15.0-20.0 ft-bgs: Stiff, gray, SILT and CLAY, some sand, trace screen (0.010-inch gravel, moist slotted). 0.1 15.0-20.0 ft-bgs: Stiff, gray, SILT and 4 S 5/5 CLAY, some sand, trace gravel, 1035.0 moist, friable (CL). 0.1 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Clay \prod USCS Silt (ML) DRILLING COMPANY: Boart Longyear LOGGED BY: MRH

DRILLER: J. Drabek

GOLDER INSPECTOR: DWM

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 20

DEPTH OF ROCK CORE:

HOLE DEPTH: 20

AZIMUTH: N/A

LOGGED BY DATE: 3/12/2013 CHECKED BY: CHECKED BY DATE:



PAGE 1 of 2

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 40	(BOREHOI COORDIN GROUND	LE LOC. IATES: SURFA	ATION: . N: 3473		PA METHOD: Sonic METHOD: N/A	GE 1 of 2
DEPTH OF SOIL DRILL: 40 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90	\$		ATE/TIM			G: CDD 1415	
					PLE INFORMATION		
다 LITHOLOGY DESCRIPTION	Graphical Log Sample No.	Or Run No. Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1045.0					No samples collected.		10-inch steel flush mount at surface. Installed 6-inch diameter steel casing in a 10-inch diameter borehole to 30.0 ft-bgs - grouted to surface and let set for >24 hours. Advanced 4-inch diameter boring through the steel casing and set a 2-inch PVC well to 39 ft-bgs. 0.0-30.0 ft-bgs cement grout.

DRILLING COMPANY: Boart Longyear DRILLER: J. Drabek

GOLDER INSPECTOR: DWM



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473628.29 E: 4685657.98 GROUND SURFACE ELEV.: 1049.84 DATUM: N/A

START DATE/TIME: 2/26/2013 1:50:00 PM END DATE/TIME: 2/28/2013 9:30:00 AM

PAGE 2 of 2

DRILLING METHOD: Sonic CORING METHOD: N/A DRILL RIG: CDD 1415

SAMPLE INFORMATION Graphical Log Sample No. or Run No. Type Soil Sample Description Att. Depth Elev. (mdd) Rec./, LITHOLOGY DESCRIPTION Or Discontinuity Data Well Well Construction Graphic (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Core PID Information Soil 0.0-30.0 ft-bgs cement grout. 1020.0 30.0-32.0 ft-bgs: Granular bentonite, 4-inch diameter hole 32.0-40.0 ft-bgs: #2 No samples collected. sand filter 34.0-39.0 ft-bgs: 2-inch PVC well screen (0.010-inch slotted) 1015.0 1010.0_ 1005.0_ 1000.0 LITHOLOGY LEGEND

DRILLING COMPANY: Boart Longyear DRILLER: J. Drabek

GOLDER INSPECTOR: DWM

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 40

PLUNGE:-90

DEPTH OF SOIL DRILL: 40 DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473166.18 E: 4685646.18 GROUND SURFACE ELEV.: 1049.15

DATUM: N/A START DATE/TIME: 9/16/2013 9:15:00 AM END DATE/TIME: 9/17/2013 5:40:00 PM

PAGE 1 of 3

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

SAMPLE INFORMATION Graphical Log Sample No. Or Run No. % /Att Soil Sample Description Depth Elev. LITHOLOGY DESCRIPTION Rec./, Well Well Discontinuity Data Graphic Construction PD (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Information Core Soil 0.0-0.5 ft.: Concrete SILTY CLAY and fine to coarse 0.5-6.0 ft.: (CL), SILTY CLAY and fine 8-inch steel flush SAND, trace fine subangular to subrounded gravel, olive to coarse SAND, trace fine mount casing. yellow, wet, soft to stiff. subangular gravel, olive yellow, wet, 0.5-1.0 ft.: Cement soft to firm. 0.0-29.0 ft-bgs: Collected ATL sample 3.5-4.0 ft Cement grout, 6/6 0 1 Sonic 10-inch diameter borehole to 29 ft. 1045.0 Installed 6-inch diameter steel casing in a 10-inch diameter borehole to 29 ft bgs grouted to surface 6.0-12.9 ft.: (CL), SILTY CLAY and fine and let set for >24 to coarse SAND, trace fine hours. Advanced sub-angular gravel, olive yellow, wet, 4-inch diameter soft to firm. boring through the 12.9-14.0 ft.: (CL), SILTY CLAY and fine to coarse SAND, trace fine subangular to subrounded gravel, steel casing and set a 2-inch PVC well to 72 ft-bgs. dark gray, wet, firm to stiff. 1040.0 8/8 0 Sonic SILTY CLAY and fine to coarse SAND, trace fine subangular to subrounded gravel, dark gray, 1035.0 14.0-24.0 ft.: (CL), SILTY CLAY and wet, firm to stiff. fine to coarse SAND, trace fine subangular to subrounded gravel, dark gray, wet, firm to stiff. Collected ATL sample 20.4-21.0 ft 12/2/13 JEFFERSON LOGS.GPJ GOLDER NH 2011.GDT Sonic 0 10 / 10 1030.0 1025.0 **JEFFERSON** LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Clayey Sand (SC-SM) USCS Silt (ML) USCS Low Plasticity Silty Clay (CL-ML) USCS Silty Sand (SM)

DRILLING COMPANY: Cascade Drilling

DRILLER: B. Beuning

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

DEPTH OF SOIL DRILL: 73 DEPTH OF ROCK CORE: AZIMUTH: N/A

HOLE DEPTH: 73



PAGE 2 of 3

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 73 DEPTH OF SOIL DRILL: 73 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473166.18 E: 4685646.18 GROUND SURFACE ELEV.: 1049.15 DATUM: N/A

START DATE/TIME: 9/16/2013 9:15:00 AM END DATE/TIME: 9/17/2013 5:40:00 PM

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
	SILTY CLAY and fine to coarse SAND, trace fine subangular to subrounded gravel, dark gray, wet, firm to stiff.		4	Sonic	0	5/5	24.0-25.4 ft.: (CL and SP), SILTY CLAY and fine to coarse SAND, trace fine subangular to subrounded gravel, dark gray, wet, firm to stiff. 25.4-29.0 ft.: (CL), SILTY CLAY and fine to coarse SAND, trace subangular to subrounded fine gravel, dark gray, clay content decreasing from previous samples, wet, stiff.		
020.0	SILT, trace fine sand, gray, wet, soft. Fine to coarse SAND and SILTY CLAY to CLAYEY SILT, trace fine to coarse subangular to subrounded gravel, brownish yellow, wet, firm to very stiff.		5	Sonic	0	8/8	29.0-30.7 ft.: (ML), SILT, trace fine sand, gray, wet, soft. 30.7-31.4 ft.: (ML), SILT, some angular to subangular gravel, brownish yellow, wet, very stiff. 31.4-37.0 ft.: (SC-SM), fine to coarse SAND and SILTY CLAY to CLAYEY SILT, trace fine to coarse subangular to subrounded gravel, brownish yellow, some gray vertical to horizontal silt seams, wet, firm to very firm. Collected ATL sample 31.0-32.0 ft		Installed 6" diameter steel casing to 29 ft bgs in 10" diameter borehole. Used 90 gallons of grout to set casing.
010.0	Fine SAND and SILT, trace fine to coarse subangular gravel, brownish yellow, wet, soft to firm. SILTY CLAY to CLAYEY SILT, trace angular to subangular fine to coarse fine gravel, yellow-brown, stiff to hard.		6	Sonic	0	6/6	37.0-39.1 ft.: (SM), fine SAND and SILT, trace fine to coarse subangular gravel, brownish yellow, wet, soft to firm. 39.1-43.0 ft.: (ML), CLAYEY SILT, some fine to coarse sand, trace fine subangular to subrounded gravel, brown, reddish brown mottling from 43.1-43.4 ft, moist, stiff to very stiff. Collected ATL sample 37.0-38.0 ft		
005.0	SILTY CLAY to CLAYEY SILT, trace angular to subangular fine to coarse fine gravel, yellow-brown, stiff to hard.		7	Sonic	0	6/6	43.0-43.4 ft.: (ML), CLAYEY SILT, some fine to coarse sand, trace fine subangular to subrounded gravel, brown, moist, stiff to very stiff. 43.4-49.0 ft.: (CL-ML), SILTY CLAY to CLAYEY SILT, trace angular to subangular fine to coarse fine gravel, yellow-brown, stiff to hard. Collected ATL sample 43.5-44.5 ft		
000.0 LITH	IOLOGY LEGEND USCS Low Plast	icity Clay				S Silt (ML)	USCS Clayey Sand (SC-SM)		

DRILLING COMPANY: Cascade Drillin DRILLER: B. Beuning

GOLDER INSPECTOR: JSP



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473166.18 E: 4685646.18 GROUND SURFACE ELEV.: 1049.15

DATUM: N/A START DATE/TIME: 9/16/2013 9:15:00 AM END DATE/TIME: 9/17/2013 5:40:00 PM

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DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

		10			-		SAMI	PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCR	RIPTION	Graphical Log	Sample No. Or Run No	Туре	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
-	Fine SANDY SILT, ye wet, firm. Fine to coarse sandy CLAY, trace fine gr brownish-gray to do moist wet, firm to v	SILTY ravel, ark gray,						49.0-49.8 ft.: (CL-ML), SILTY CLAY to CLAYEY SILT, trace angular to subangular fine to coarse fine gravel, yellow-brown, stiff to hard. 49.8-50.0 ft.: (ML), fine SANDY SILT, yellow-brown, wet, firm. 50.0-55.2 ft.: (CL-ML), fine to coarse sandy CLAYEY SILT, some cobbles, some subangular to subrounded fine to coarse gravel, brown, moist, very		
995.0	~ ~ ?			8	Sonic	0	10.5 /	stiff. 55.2-55.4 ft.: (CH-CL), SILTY CLAY, gray, moist, firm to stiff. 55.4-56.0 ft.: (MH), CLAYEY SILT, some fine to coarse sand, black, wet, stiff.		90 gallons of grout, 95% Portland Type
-								56.0-59.0 ft.: (CL), fine to coarse sandy SILTY CLAY, brownish-gray to dark gray, moist, stiff to very stiff. Collected ATL sample 55.4-56.0 ft	X X X	I/II Cement and 5% Quick-gel Bentonite Powder (5 bags, 94#/bag) wit 30 gallons of water
990.0						7		59.0-69.0 ft.: (CL), fine to coarse sandy SILTY CLAY, brownish-gray to dark gray, moist, stiff to very stiff. Collected ATL sample 59.0-60.0 ft		
-										62.0-64.5 ft.: 1/2 bag of bentonite chips.
985.0				9	Sonic	0	11 / 10			64.5-73.0 ft.: 4 bags #40 Red Flint Sand (50#/bag)
-										67.0-72.0 ft.: 2" diameter, 0.01"- slotted PVC pipe.
980.0				1822		0		69.0-71.0 ft.: (CL), fine to coarse sandy SILTY CLAY, trace angular to subangular fine gravel, gray, moist, very stiff. 71.0-73.0 ft.: (CL-ML), SILTY Clay to		
				10	Sonic	0	4/4	CLAYEY SìLT, some fine to coarse sand, gray, wet, firm to stiff. Collected ATL sample 69.0-70.0 ft		
975.0		9-2								
LITH	HOLOGY LEGEND	USCS Low Plastici (CL) USCS Silty Sand (USCS	Silt (ML) Low Plasticit CL-ML)	USCS Clayey Sand (SC-SM)		

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 73 DEPTH OF SOIL DRILL: 73 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90



PAGE 1 of 3

PROJECT HOLE DE DEPTH C	OF SOIL DRILL: 73 OF ROCK CORE:		BOR COO GRO DATI	EHOL RDINA JUND : JM: N RT DA	E LOC ATES: SURF/ /A .TE/TII	ATION: N: 3473 ACE ELE ME: 9/16/ : 9/18/20	V.: 1049.14 CORING M DRILL RIG: 13 1:54:00 PM	PAI METHOD: Roto-Soni IETHOD: N/A : GP24-300RS	GE 1 of 3
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No.	Type	PID (ppm)	Soil Rec./Att.	PLE INFORMATION Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1045.0	Sandy SILT, brown to black, dry, soft. SILTY CLAY, light gray to olive gray to dark gray, moist to wet, soft.		1	Sonic	13.8	5/5	0.0-2.3 ft.: (ML), sandy SILT, brown to black, dry, soft. 2.3-4.3 ft.: (CL), SILTY CLAY, some fine to coarse sand, dark gray, moist, firm to hard. 4.3-5.0 ft.: (CH-CL), SILTY CLAY, light gray with some brown staining, stronger odor than detected by PID, soft.		8-inch steel flush mount casing. 0.5-1.0 ft.: Cement 0.0-29.0 ft-bgs: Cement grout, 10-inch diameter borehole to 29 ft. Installed 6-inch diameter steel casing in a 10-inch
1040.0	SILTY CLAY and fine to coarse SAND, trace fine subangular gravel, gray to brown, wet, stiff. Fine to medium SAND, some silt,		2	Sonic	0	- 10 / 10	5.0-6.7 ft.: (CH-CL), SILTY CLAY, light gray with some brown staining, stronger odor than detected by PID, soft. 6.7-8.2 ft.: (CL), SILTY CLAY, olive gray, wet, soft. 8.2-8.55 ft.: (CL), SILTY CLAY, trace fine subangular gravel, olive gray, brown staining with odor, wet, soft. 8.55-8.6 ft.: (CL), SILTY SAND, brown, wet, loose. 8.6-9.9 ft.: (CL), SILTY CLAY and fine to coarse SAND, trace fine subangular gravel, gray to brown, odor, wet, stiff.		casing int Jorind diameter borehole to 29 ft bgs - grouted to surface and let set for >24 hours. Advanced 4-inch diameter boring through the steel casing and set a 2-inch PVC well to 72 ft-bgs.
1035.0	trace subangular gravel, brown, wet, compact. SILTY CLAY and fine to coarse SAND, some rounded cobbles, trace to some subrounded to rounded gravel, gray, wet, stiff.				0		9.9-10.0 ft.: (SP-SM), fine to medium SAND, some silt, trace subangular gravel, brown, odor, wet, compact. 10.0-10.2 ft.: (SP-SM), fine to medium		
1030.0			3	Sonic	0	10 / 10	SAND, some silt, trace subangular gravel, brown, odor, wet, compact. 10.2-11.0 ft.: (SP-SM), fine to medium SAND, some silt, brown, odor, wet, compact. 11.0-25.0 ft.: (CL), SILTY CLAY and fine to coarse SAND, some rounded cobbles 1" in diameter and 2.5" long, trace to some subrounded to rounded gravel, gray, wet, stiff. Collected ATL sample 14.0-14.5 ft		
1025.0 LITH	HOLOGY LEGEND USCS Silt (ML) USCS Poorly-gr with Silt (SP-SM				Clay (S Low to High	(CL)		
22011	USCS Poorly-gr with Silt (SP-SM	aded Sand)	Z		USCS (SC-S	Clayey Sar	USCS Silty Gravel	P	

DRILLING COMPANY:
DRILLER: B. Beuning
GOLDER INSPECTOR

GOLDER INSPECTOR: JSP



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473322.68 E: 4685890.42 GROUND SURFACE ELEV.: 1049.14

START DATE/TIME: 9/16/2013 1:54:00 PM END DATE/TIME: 9/18/2013 1:40:00 PM

PAGE 2 of 3

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

SAMPLE INFORMATION Graphica Sample No. Or Run No. /Att Soil Sample Description Depth Elev. (mdd) LITHOLOGY DESCRIPTION Log Rec. Well Well Type Construction Discontinuity Data Graphic Information PID (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Soil 25.0-29.0 ft.: (CL), SILTY CLAY and fine to coarse SAND, some rounded SILTY CLAY and fine to coarse SAND, some rounded cobbles, cobbles 1" in diameter and 2.5" long, trace to some subrounded to rounded gravel, gray, wet, stiff. trace to some subrounded to rounded gravel, gray, wet, stiff. 4/4 4 0 Sonic 1020.0 29.0-29.6 ft.: (CL), SILTY CLAY and 0-29.0 ft.: Installed fine to coarse SAND, trace to some 6-inch diameter Fine to coarse SAND and SILTY steel casing to 29 ft fine subrounded to rounded gravel, bgs. 75 gallons of grout, 95% Portland CLAY to CLAYEY SILT, trace gray, wet, stiff. 29.6-31.0 ft.: (SC-SM), fine to coarse SAND and SILTY CLAY to CLAYEY fine to coarse subangular gravel, yellowish brown, wet, Type I/II Cement and 5% Quick-gel Bentonite Powder (7 very dense. SILT, trace fine to coarse subangular gravel, yellowish brown, 1/2 inch fine 6/6 5 Sonic 0 to coarse silty sand seam at 30.5 ft bags, 94#/bag) with 30 gallons of water. bgs, very dense. Collected ATL sample 30.0-31.0 ft 31.0-31.7 ft.: (SP-SM), medium SILTY 1015.0 SAND, poorly graded, yellowish brown, wet, loose to compact. 31.7-35.0 ft.: (SC-SM), fine to coarse SAND and SILTY CLAY to CLAYEY SILTY GRAVEL, some fine to coarse sand, wet, loose. SILT, some fine subangular to SILTY SAND, poorly graded, subrounded gravel, yellowish brown, trace fine subangular gravel, yellowish brown, wet, loose. wet, very dense. Collected ATL sample 34.0-35.0 ft 35.0-35.5 ft.: (GM), SILTY GRAVEL, some fine to coarse sand, wet, loose. SILTY GRAVEL, rounded to 35.5-38.0 ft.: (SP-SM), fine SILTY subrounded, some fine to SAND, poorly graded, trace fine coarse sand, brown, wet, loose subangular gravel, yellowish brown, 1010.0 to compact. wet, loose. 38.0-39.7 ft.: (GM) SILTY GRAVEL SILTY CLAY to CLAYEY SILT, rounded to subrounded, some fine to some fine sand, trace coarse sand, brown, wet, loose to subrounded gravel, dark brown to brown to gray, dry to wet, 39.7-39.8 ft.: (SP-SM), fine SILTY stiff to very stiff. SAND, poorly graded, brown, wet, 39.8-42.0 ft.: (MH/CL), CLAYEY SILT to SILT CLAY, some subangular to 12/2/13 6 0 20 / 20 Sonic subrounded gravel, brown, moist, stiff to very stiff. 11.GDT 42.0-42.3 ft.: (MH/CL), CLAYEY SILT, trace subrounded gravel, yellowish 1005.0 NH 201 brown with light gray mottling, soft to 43.2-46.4 ft.: (CL), SILTY CLAY, fine to GOLDER coarse, trace subangular to subrounded gravel, yellowish brown, moist, very stiff. Collected ATL sample 43.5-44.5 ft JEFFERSON LOGS.GPJ 46.4-47.5 ft.: (MH and CL), CLAYEY SILT, trace fine subangular to subrounded gravel, dark brown, varved gray and black clay stringers, stiff to very stiff. 1000.0 LITHOLOGY LEGEND USCS Low to High Plasticity Clay (CL-CH) USCS Clayey Sand (SC-SM) USCS Low Plasticity Clay (CL) USCS Silt (ML) USCS Poorly-graded Sand with Silt (SP-SM) USCS Silty Gravel

DRILLING COMPANY: Cascade Drilling DRILLER: B. Beuning

GOLDER INSPECTOR: JSP

ELLECTROLUX

PROJECT: Electrolux Jefferson

PLUNGE:-90

PROJECT NO.: 103-87305

DEPTH OF SOIL DRILL: 73 DEPTH OF ROCK CORE:

HOLE DEPTH: 73

AZIMUTH: N/A



PAGE 3 of 3

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 73 DEPTH OF SOIL DRILL: 73 DEPTH OF ROCK CORE: AZIMUTH: N/A PLUNGE:-90

BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473322.68 E: 4685890.42 GROUND SURFACE ELEV.: 1049.14 DATUM: N/A START DATE/TIME: 9/16/2013 1:54:00 PM END DATE/TIME: 9/18/2013 1:40:00 PM

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

AZIMUTH	H; N/A PLUNGE:-90		LIND	DATE	J I IIVIC		13 1:40:00 PM PLE INFORMATION		
Elev.	LITHOLOGY DESCRIPTION	Graphical	Sample No. Or Run No.	Туре	PID (ppm)	Soil Rec./Att. or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip. Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
995.0	Fine SAND to SILTY SAND, poorly graded, brownish yellow, two gray clay seams approximately 1/8" thick, wet, loose. CLAYEY SILT, trace subangular to subrounded gravel, yellowish brown to gray, wet, very stiff. Fine SILTY SAND, poorly graded, brown, wet, loose.		6	Sonic	0	20 / 20	47.5-50.0 ft.: (CL), SILTY CLAY, some fine to coarse sand, dark brown, moist, stiff to very stiff. Collected ATL sample 47.9-48.5 ft 50.0-50.9 ft.: (SP-SM), fine SAND to SILTY SAND, poorly graded, brownish yellow, two gray clay seams approximately 1/8" thick, wet, loose. 50.9-52.7 ft.: (CL/MH), CLAYEY SILT, trace subangular to subrounded gravel, yellowish brown to gray, wet, very stiff. 52.7-54.5 ft.: (SM), fine SILTY SAND, poorly graded, brown, with 1/16" gray		
990.0	SANDY SILTY CLAY, fine to coarse, trace rounded to subrounded fine gravel, brown to gray, moist, very stiff.				- II		clay stringers, loose. 54.5-55.4 ft.: (CL), sandy SILTY CLAY, trace subrounded gravel, brown to gray, dry, stiff to very stiff. 55.4-55.5 ft.: (SM), SILTY SAND, poorly graded, brown, wet, loose. 55.5-67.0 ft.: (CL), SANDY SILTY CLAY, fine to coarse, trace rounded to subrounded fine gravel, brown to gray, moist, very stiff. Collected ATL sample 59.7-60.2 ft		
, -			7	Sonic	0	12.5 /			62.0-64.5 ft.: 1/2 bag of bentonite chips.
085.0				3 m		3.5			64.5-73.0 ft.: 4 bags of #40 Red Flint Sand (50#/bag)
980.0	Fine SILTY SAND, poorly graded, brown, wet, loose.		8	Sonic	0	6.876	67.0-70.0 ft.: (CL), SANDY SILTY CLAY, fine to coarse, trace rounded to subrounded fine gravel, brown to gray, moist, very stiff. 70.0-72.2 ft.: (SM), fine SILTY SAND, poorly graded, brown, wet, loose. 72.2-73.0 ft.: (SM), fine SILTY SAND, poorly graded, brown, with thinly laminated orange to brown day stringers, wet, loose.		67.0-72.0 ft.: 2" diameter, 0.01"- slotted PVC pipe.
975.0									
LITH	HOLOGY LEGEND USCS Silt (ML) USCS Poorly-grawth Silt (SP-SM)	aded Sand			Clay (Low to High CL-CH) Clayey Sand	(CL)	,	

DRILLING COMPANY: Cascade Drilling DRILLER: B. Beuning

GOLDER INSPECTOR: JSP



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473101.32 E: 4685852.25 GROUND SURFACE ELEV.: 1051.88

DATUM: N/A START DATE/TIME: 9/19/2013 1:15:00 PM END DATE/TIME: 9/21/2013 10:25:00 AM

PAGE 1 of 2

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

SAMPLE INFORMATION Graphical Log Sample No. or Run No. % /Att Soil Sample Description Depth Elev. PID (ppm) LITHOLOGY DESCRIPTION Well Well Rec./ Discontinuity Data Graphic Construction (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Information Soil 0.0-1.7 ft.: (SM), fine to coarse SAND and SILT, organics (corn field), light Fine to coarse SAND and SILT, 0.0-29.0 ft-bgs: organics (corn field), light brown to beige, moist, loose. brown to beige, moist, loose.

1.7-3.0 ft.: (ML), SILT, some sand, dark brown, dry, loose.

3.0-4.5 ft.: (ML), CLAYEY SILT, some Cement grout, 10-inch diameter borehole to 29 ft. 1050.0 SILT, some sand, dark brown. dry, loose. fine to coarse subangular gravel, light brown with brown mottling, dry, Installed 6-inch 1 Sonic 0 5/5 diameter steel stiff to very stiff. casing in a 10-inch CLAYEY SILT, some fine to 4.5-5.0 ft.: (ML), CLAYEY SILT, some fine to coarse gravel (larger than previous sample), brown with beige diameter borehole coarse gravel, brown with to 29 ft bgs- grouted beige mottling, dry, stiff to very to surface and let set for >24 hours. mottling, dry, stiff to very stiff. Advanced 4-inch 5.0-14.7 ft.: (CL), SILTY CLAY, some SILTY CLAY, some fine to coarse diameter boring fine to coarse rounded gravel (two rounded gravel, light brown with brown mottling, wet, soft. through the steel bore hole sized pieces), light brown casing and set a 2-inch PVC well to with brown mottling increasing with depth, wet, soft, 38 ft-bgs. Well has 1045.0 2.41 ft of stickup with bumper posts 0 around the well. 2 9/9 Sonic 0 1040.0 14.7-23.0 ft.: (CL), SILTY CLAY and fine to coarse SAND, trace fine gravel, sub angular to sub rounded, SILTY CLAY and fine to coarse gray with brown mottling, wet, soft to firm. SAND, trace fine gravel, sub angular to sub rounded, gray with brown mottling, moist to 0 wet, soft to stiff. 1035.0 GOLDER NH 2011.GDT 12/2/13 3 9/9 Sonic 0 JEFFERSON LOGS.GPJ 1030.0 LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Silty Sand (SM) USCS Silt (ML) USCS Low Plasticity Silty Clay (CL-ML) ELLECTROLUX

DRILLING COMPANY: Cascade Drilling DRILLER: B. Beuning

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305

PLUNGE:-90

HOLE DEPTH: 40 DEPTH OF SOIL DRILL: 40 DEPTH OF ROCK CORE:

AZIMUTH: N/A



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473101.32 E: 4685852.25 GROUND SURFACE ELEV.: 1051.88 DATUM: N/A START DATE/TIME: 9/19/2013 1:15:00 PM END DATE/TIME: 9/21/2013 10:25:00 AM

PAGE 2 of 2

DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

AZIMUTH	H: N/A PLUNGE:-90		END	DATE	TIME		13 10:25:00 AM PLE INFORMATION		
Depth Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. or Bun No	Туре	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
1025.0 _	SILTY CLAY and fine to coarse SAND, trace fine gravel, sub angular to sub rounded, gray with brown mottling, moist to wet, soft to stiff.		4	Sonic	0	6/6	23.0-25.0 ft.: (CL), SILTY CLAY and fine to coarse SAND, trace fine gravel, sub angular to sub rounded, gray with brown mottling, wet, soft to firm. 25.0-29.0 ft.: (CL), SILTY CLAY, some fine sub-angular to sub-rounded gravel, gray, dryer than above, stiff.		25.0-30.5 ft.: 1 bag of bentonite chips.
1020.0	CLAYEY SILT and fine to coarse		5	Sonic		6/6	29.0-33.2 ft.: (ML), CLAYEY SILT, some fine to coarse SAND, trace subrounded fine gravel, gray, moist, stiff. 33.2-35.5 ft.: (ML), CLAYEY SILT and fine to coarse SAND, trace sub-rounded fine gravel, brown, moist, stiff to very stiff.		Installed 6-inch diameter steel casing to 29 ft bgs. 90 gallons of grout (30 gallons used), 9 bags Portland Type I/II Cement and 1/3 bag Quick-gel Bentonite Powder (bags, 94#/bag) with 30 gallons of water.
	SAND, trace sub-rounded fine gravel, brown, moist, stiff to very stiff.				0		25 F 2C C D . (MIL CL) CLAVEV CILT		30.5-40.0 ft.: 4.5 bags of #40 Red Flint Sand (94#/bag) 33.0-38.0 ft.: 2"
1015.0 _	CLAYEY SILT, some fine to coarse sand, trace fine gravel, light brown, brown, gray and beige, wet, firm to very stiff.		6	Sonic	0	5/5	35.5-36.6 ft.: (ML-CL), CLAYEY SILT, some fine to coarse sand with light gray sitty clay seams, brown to gray, wet, firm to stiff. 36.6-37.5 ft.: (ML-CL), CLAYEY SILT, some fine sub-rounded gravel, more gravel near bottom of sample, light brown to beige, moist, stiff. 37.5-40.0 ft.: (ML-CL), CLAYEY SILT to SILTY CLAY and fine to coarse sand, trace fine rounded gravel, moist, very stiff to hard.		diameter, 0.01"- slotted PVC pipe.
1010.0								*	
1005.0 _									
LITH	OLOGY LEGEND USCS Silty San USCS Low Plas Clay (CL-ML)				USCS	S Sift (ML)	USCS Low Plasticity Clay (CL)		
DRILLER	G COMPANY: Cascade Drilling 8: B. Beuning	21			CH	HECKED	Y DATE: 10/29/2013	(Golder

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 40 DEPTH OF SOIL DRILL: 40 DEPTH OF ROCK CORE:



BOREHOLE LOCATION: Jefferson, IA COORDINATES: N: 3473358.9 E: 4685730.21 **GROUND SURFACE ELEV.: 1050.81** DATUM: N/A

START DATE/TIME: 9/16/2013 8:15:00 AM END DATE/TIME: 9/20/2013 2:36:00 PM

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DRILLING METHOD: Roto-Sonic CORING METHOD: N/A DRILL RIG: GP24-300RS

SAMPLE INFORMATION Graphical Sample No. or Run No. % Soil Sample Description Depth Elev. (mdd) Rec. Well LITHOLOGY DESCRIPTION Log Well Or Discontinuity Data Graphic Construction PID (Depth, Dip, Angle From Core Axis, Type, and Surface Description) Information Core Soil Used 17.25" diameter tricone bit to drill 8-inch steel flush to 29 ft (mud rotary). See lithology 1050.0 from MW-47D. mount casing. 0.5-1.0 ft.: Cement 0.0-29.0 ft-bgs: Cement grout, 17.25-inch diameter borehole to 29 ft set 12" diameter casing. 0.0-61.0 ft-bgs: Cement grout, 10-inch diameter borehole to 61 ft set 1045 0 6" diameter casing. Installed 12-inch diameter steel casing in a 17.25-inch diameter borehole - grouted to surface and let set for >24 hours. Continued drilling with a 10-inch diameter borehole to 61 ft and installed 6-inch diameter steel casing -groutedto surface 1040.0 and let set for > 24 hours. Advanced 4-inch diameter boring through the steel casing and set a 2-inch PVC well to 73 ft-bgs. 1035.0 JEFFERSON LOGS.GPJ GOLDER NH 2011.GDT 12/2/13 1030.0 JEFFERSON LITHOLOGY LEGEND USCS Low Plasticity Clay (CL) USCS Poorly-graded Sand with Silt (SP-SM) USCS Low Plasticity Silty Clay (CL-ML) USCS Silty Sand (SM) USCS Silt (ML) ELLECTROLUX LOGGED BY: CJS

DRILLING COMPANY: Cascade Drilling DRILLER: B. Beuning/ T. Schmalelft

GOLDER INSPECTOR: JSP

PROJECT: Electrolux Jefferson PROJECT NO.: 103-87305 HOLE DEPTH: 74

PLUNGE:-90

DEPTH OF SOIL DRILL: 74 DEPTH OF ROCK CORE:

AZIMUTH: N/A

LOGGED BY DATE: 10/31/2013 CHECKED BY: JSP CHECKED BY DATE: 11/4/2013



DEPTH	EPTH: 74 OF SOIL DRILL: 74 OF ROCK CORE: H: N/A PLUNGE:-90		DATE	JM: N	/A TE/TIN	ME: 9/16/ : 9/20/20		METHOD: N/A : GP24-300RS	
Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. Or Run No.	Type	PID (ppm)	Soil Rec./Att.	Soil Sample Description or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
025.0 _									
- - 020.0 _ - -	SILTY CLAY and fine to coarse SAND, some fine rounded gravel, gray, moist, stiff. Fine SILTY SAND, poorly graded, some silt, trace gravel, yellow-brown, wet, loose to compact CLAYEY SILT, some fine to coarse sand, trace fine gravel, yellow-brown, odor, moist, very stiff.		1	Sonic	0 13.6 220.2	6/6	29.0-31.5 ft.: (CL), SILTY CLAY and fine to coarse SAND, some fine rounded gravel (baseball sized), gray, moist, stiff. 31.5-33.0 ft.: (SM), fine SILTY SAND, well graded, wet, loose to compact. 33.0-33.3 ft.: (GM/SM), SILTY GRAVEL and fine SAND, yellow-brown, wet, compact. 33.3-33.5 ft.: (SP/SM), fine SAND, poorly graded, some silt, yellow-brown, wet, loose. 33.5-34.8 ft.: (CL/ML), CLAYEY SILT, some fine to coarse sand, trace fine gravel, yellow-brown, odor, moist, very stiff.	ND, act. Sign of the state of t	0-29.0 ft.: Installed 12-inch diameter steel casing to 29 ft bgs. 75 gallons of grout, 95% Portland Type I/II Cement (7 bags, 94#/bag) and 5% Quick-gel Bentonite Powder with 30 gallons of water.
015.0 _	Fine SILTY SAND, poorly graded, yellow-brown with reddish-brown mottling, wet, loose.	-	2 Soni	Sonic	399.6 706.1 469.8 132.1 393.4 314.6	10 / 10	34.8-35.0 ft.: (SM/GM), fine SILTY SAND and GRAVEL, sub-rounded, poorly graded, yellow-brown, odor, wet, loose. 35.0-44.5 ft.: (SM), fine SILTY SAND, poorly graded, yellow-brown with reddish-brown mottling, odor at approximately 36.5 ft, wet, loose. 44.5-45.0 ft.: (ML), CLAYEY SILT, trace fine sand, yellow-brown, odor, wet, loose to compact.		
	CLAYEY SILT, trace fine sand, yellow-brown, odor, wet, loose to compact. Fine SILTY SAND, poorly graded, yellow-brown, odor, wet, loose. CLAYEY SILT, some fine to coarse sand, brown, odor, wet, soft.		3	Sonic	62.5 168.1 90.2 67.8	10 / 10	45.0-47.5 ft.: (SM), fine SILTY SAND, poorly graded, yellow-brown, odor, wet, loose. 47.5-49.2 ft.: (ML), CLAYEY SILT, some fine to coarse sand, brown, odor, wet, soft.		

DRILLING COMPANY: Cascade Drilling DRILLER: B. Beuning/ T. Schmalelft GOLDER INSPECTOR: JSP



EPTH (EPTH: 74 DF SOIL DRILL: 74 DF ROCK CORE: H: N/A PLUNGE:-90		DATU	JM: N	/A TE/TII	ME: 9/16/ :: 9/20/20		ETHOD: N/A GP24-300RS	
Elev.	LITHOLOGY DESCRIPTION	Graphical Log	Sample No. or Run No.	Type	PID (ppm)	Soil Rec./Att. Or Core Rec. %	Soil Sample Description Or Discontinuity Data (Depth, Dip, Angle From Core Axis, Type, and Surface Description)	Well Graphic	Well Construction Information
0.000.0	CLAYEY SILT to SILTY CLAY, trace fine angular to sub-angular gravel, brownish gray, moist to dry, very stiff to hard. Sandy SILTY CLAY, fine to coarse, trace fine sub-angular to sub-rounded gravel, dark gray to gray, moist to dry, very				0		49.2-49.5 ft.: (CL/ML), CLAYEY SILT to SILTY CLAY and fine to coarse SAND, trace fine sub-angular to sub-rounded gravel, brown, odor, moist, very stiff. 49.5-52.5 ft.: (CL), CLAYEY SILT to SILTY CLAY, trace fine angular to sub-angular gravel, brownish gray, dry, hard. 52.5-55.5 ft.: (CL), sandy SILTY CLAY, fine to coarse, some fine sub-angular		
995.0 _	stiff to hard.				0		gravel, dark gray, dry, hard. 55.0-57.0 ft.: (CL), sandy SILTY CLAY, fine to coarse, some fine sub-angular gravel, gray, moist, very stiff to hard. 57.0-61.0 ft.: (CL), sandy SILTY CLAY,		
			4	Sonic	0	7.5 / 6	fine to coarse, some fine sub-angular to sub-rounded gravel, gray with black mottling at 58 ft bgs, moist, very stiff to hard.		60.0-65.0 ft.: 1 bag (
990.0 _							61.0-70.9 ft.: (CL), sandy SILTY CLAY, fine to coarse, trace fine sub-angular to sub-rounded gravel, dark gray, very stiff to hard. Collected ATL sample 68-69 ft		bentonite chips (50#/bag) Cement grout, 10-in- diameter borehole to 61 ft set 6" diameter casing.
985.0							70.9-71.6 ft.: (SP/SM), fine to coarse SILTY SAND, poorly graded, trace fine to coarse rounded gravel (quartz marble sized to green rounded rock approximately billiard sized ball), gray, wet, loose. 71.6-74.0 ft.: (CL), sandy SILTY CLAY, fine to coarse, some sub-rounded fine gravel, gray, dry to moist, very		65.0-74.0 ft.: 3.5 bag of #40 Red Flint Sand (94#/bag)
			5	Sonic	0	13.7 / 13	stiff.		68.0-73.0 ft.: 2" diameter, 0.01"- slotted PVC pipe.
980.0	Fine to coarse SILTY SAND, poorly graded, trace fine to coarse rounded gravel, gray, wet, loose. Sandy SILTY CLAY, fine to coarse, some sub-rounded fine gravel, gray, dry to moist, very stiff.				0	,			
LITH	IOLOGY LEGEND USCS Low Plast (CL) USCS Silty Sand				with Si	Poorly-grade It (SP-SM) Silt (ML)	ed Sand USCS Low Plasticity Sity Clay (CL-ML)		
	G COMPANY: Cascade Drilling 8: B. Beuning/ T. Schmalelft				LC	GGED B	Y DATE: 10/31/2013		Golder

